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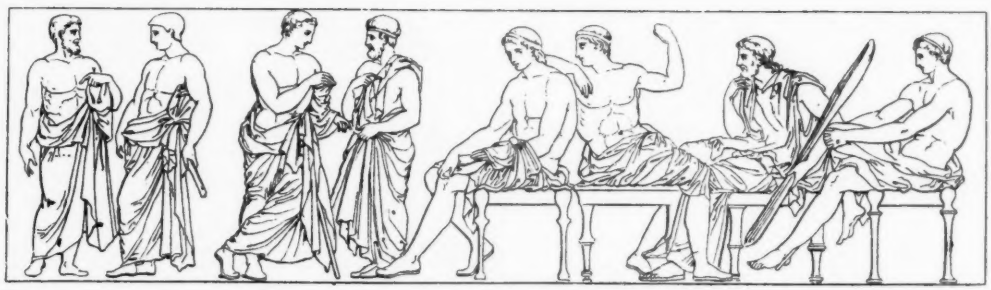

The Æsthetic of the Ancients*

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"The Ancients represented *existences*, we usually represent the *effect*; they portrayed the terrible, we terribly; they the agreeable, we agreeably; and so forth. Hence our exaggeration, mannerism, false graces, and all excesses. For when we strive after effect, we never think we can be effective enough. . . ."

"People talk of the study of the Ancients; but what does it mean except that we should look at the real world and strive to express it, for that is what they did . . . ."

"All eras in a state of decline are subjective; on the other hand, all progressive eras have an objective tendency. Our present time is retrograde, for it is subjective."—GOETHE (in Lewes's *Life and Works*.)

I.

TRUE history is a history of Ideas, not of kings and conquerors, nor of poets and statesmen, nor of buildings and statuary; and a true History of Art is a History of Artistic Ideas. Moreover, true history is an excellent dispenser and leveller of opinions. To study her sympathetically is to get both knowledge of the past and magnanimity for the present. If in modern times, they who are appointed dictators of taste, and expatiate on the merits or demerits of this or that phase of art, would turn back to antiquity, not for inspiration in styles of workmanship, but for a proper understanding of the artistic Ideas of the ancients themselves, much of the conflict which distracts us in our artistic production to-day would be freed from the irrelevance and fruitless argumentation which comes of the absence of the historical sense.

The purpose of this Essay is to seek to establish the standards of the ancients with respect to their own works of art—in effect to discover how far Art, as an Idea, existed in past ages, particularly in those ages now held most worthy of admiration and study, and thence to draw conclusions as to the legitimacy of modern æsthetic criteria. It is to the ideas of the ancients rather than to their forms that we shall endeavour to attract attention—not, as is too general in modern artistic education and practice, to enhance the forms at the expense of the ideas which created them. It is a matter of regret that modern architects, sculptors and painters should constantly revert to and exploit the forms of Greek or Egyptian or Chinese art (to mention but three favourite exemplars) and yet not understand nor care to know the nature and ideas of the people who produced that art and made it what it was. Art historians suffer from the fault which sets up modern standards of critical analysis and appreciation for the judgment of the products of another age and race. The customs of the past are forgotten; erudite treatises are written—on the lotus or swastika, for instance—unfolding its history as ornament and its passage from people to people and from time to time; yet the symbolism which gave it its birth and carried it to the four corners of the world is passed over.

Our complaint is not to be removed until some general recognition is forthcoming that artistic ideas have not existed from all time—that they are not innate in all people. It is our contention in these few pages that follow that the attribution of self-conscious beauty to works of art is a phenomenon of comparatively modern times—a phenomenon which can be accounted for and dated—and that art in antiquity has no *raison d'être* except in its uses and its relation to life. To the modern mind art is an abstraction. Its highest function (and to many its *only* function) is the presentation or externalisation of an absolute value,

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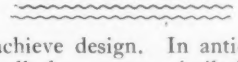
Beauty. This beauty is independent of any representational content or of any utilitarianism. It is deliberately *designed* to that end, Beauty, by the creative imagination or fancy of a specially qualified mentality—namely, the artist's. Whence a piece of music, final and self-sufficient, almost a cosmos in miniature, and yet without a subject or a story to tell, is the modern ideal, to which all arts should approximate.

This exalted conception has, nevertheless, had a short course, and is not of so long a duration in time as the examples, treasured in our museums and galleries, that have been attributed to its presence and activity. The æsthetic sensibility—if we may call it so—an independent activity of the human mind, having no relation to the representation of images, real or fantastic, teaching no lessons, illustrative of nothing, and purposeless except in so far as it is peculiarly fitted to satisfy the unique craving for beauty, in itself and for its own sake, has had a history which we shall do well to study, and a knowledge of which will order and heal many of the artistic difficulties of the present day. To this problem we now address ourselves.

II.

Decoration as a deliberate motive is absent in primitive art. Deliberate Design, the moulding of forms to produce æsthetic effects, is absent likewise. The primitives and ancients designed because they were compelled to by their natures, by their ignorance, by their conservatism and tenacious traditions; it was left to a later time to discover that unconscious, almost elusive, character in their work and call it Design.

A child will represent water by a series of waves, perhaps thus :—



and thereby achieve design. In antiquity a race of artists would all draw water similarly and thereby achieve a convention which would become traditional. Their deliberate intention, first and last, was the representation of water; yet simultaneously they produced that Something which makes for Art.

The arts of the ancients in their purest and most spontaneous forms do not know of our modern conception of Art Value. The arts of the ancients have always a deliberate motive—utility, representation, symbolism. A figure, for example, represents a human being, an animal, a monster, a deity; it serves maybe as a fetish, an idol; it is usually magical. Ornaments are symbols; decorations are sometimes preliminary to writing and always convey a meaning. The plastic and pictorial arts are the objectification or accompaniment of ritual. Poetry and music are originally created in ceremonial dancing; and even where they begin to have an independent existence they become the appropriate vehicles of the myths and mysteries of the people, and what the people have of history, science and law are preserved and transmitted in verse and song. The arts of the ancients are direct and purposeful. Their design is dictated, not by creative fancy, but by national character, exigencies of material, and the continuity of tradition; while of Art Value in them, there is none.

Personal ornament is the oldest of arts. Yet it would be a difficult undertaking to infer from its age and universality an equal age and universality in the conception of the Beautiful. Personal ornament has generally other motives than that of vanity, though never that of disinterested beauty. For instance, painting of the body is ceremonial and accompanies such rites as initiation or the celebrations of love and war. Colours have definite meanings. On account of the abundance of red ochre, or on account of its resemblance to blood, red is the most common. The first red body-painting may well have been the blood of beasts or enemies slain in hunting or war and smeared on to avert sorcery. The paint of mourners may be designed to make the wearer unrecognisable to the wandering souls of the dead. Scarification and tattooing are protective like amulets. Tattooing sometimes represents the likeness of the guardian divinity. It may also indicate age, state of matrimony, rank or tribe. Scarification even acquires further functions as a test of courage and endurance. It is never pure decoration.

The forms of primitive art are representational. Motives are drawn from nature; the primitive artist has no other exemplar, and he never makes patterns from nothing. He is saturated with the principle of animism, and even his non-representative utilitarian works are often compelled to imitate nature so far as their conditions will allow. A ship imitates a fish, and eyes are painted on the prows; tables and chairs imitate quadrupeds; the lion's foot of modern furniture is only a quaint survival of an earlier age when it had a real meaning. Primitive art from beginning to end is guided by utilitarian and superstitious necessity, and its forms are the forms of nature. An ancient Chinese once said: "All ceremonial usages are the embodiment of the ideas suggested by heaven and earth; take their laws from the changes of the four seasons; imitate the operation of the contracting and developing movements in nature, and are conformed to the feelings of men. It is on this account that they are called the Rules of Propriety; and when anyone finds fault with them he only shows his ignorance of their origin."*

If we who live in cities and have renounced agriculture as a livelihood, and Nature as a religion, find it hard to understand the unavoidable naturalism of

* W. R. Lethaby, *Architecture, Mysticism and Myth, Ch.* 1.

primitive art, we are then in danger of misunderstanding primitive art also.

Primitive art, always purposeful and naturalistic, is also traditional. The modern view—dating from the innovations of the Romantics, and holding, as it does, that all great art is untrammelled and free of restraints—again fails to appreciate primitive art, an art which knows of no liberties, but is bound by obstinate traditions. "Primitive man," says Herbert Spencer, "deviates into novelty only through unintended modifications." His arts are not devised, but evolved, like languages.

Traditional conventions are perpetuated long after the original naturalism or purpose has been lost by continual repetition. Hence they may be transferred to another material. Technic patterns are usually representations in another material. The stitch and seam of cloth are reproduced *ornamentally* in textiles, woven grasses and basket-plaiting on pottery, the binding thongs of flint weapons on bronze spear- and axe-heads. The history of much architectural ornament is traceable to changes of material. The Egyptian gorge and filet have their source in an architecture of reeds; the Lycian tombs and Doric and Ionic orders in an architecture of wood. The Hindu temple with its cunilinear spire is directly derived from the sacrificial rites of the ancient Aryans. Together with the royal umbrella as its crowning feature, there is not in it a detail whose origin cannot be recognised.

The doctrine of the Pure Art Value and of Significant Form is accordingly an historical heresy which has no justifying precedent in those art periods which its adherents most revere and affect. Art in the past has had a relation to life which was not æsthetic. The pre-historic cave-paintings, which have so recently caused a furore in both artistic and ethnological circles, are known to have been connected with sympathetic magic. We have now, particularly among sculptors, a school of Ægyptophils. But the Egyptians were not artists in our sense of the word. The huge incised reliefs in the temple walls of Thebes were religious and historical records. The paintings in the tombs, crowded with eschatological scenes and hieroglyphics, were no less magical than the pre-historic cave-paintings, and no more artistic in intention; they were consigned to eternal darkness and not to æsthetic enjoyment. It would be difficult to justify on æsthetic grounds the deliberate elimination of unnecessary detail, which is so much admired in the sculpture of ancient Egypt; but on the grounds of the existence of a tenacious convention, dating from a time when sculptors had not the skill to work otherwise than in extreme simplicity, a justification is simple. In the Fourth Dynasty, Egyptian sculpture was developing a realism which, unchecked, might have been indulged in nudes like the Laocoon and draperies like Bernini's. Egyptian architecture was controlled entirely by inherited tradition, and its forms were governed by the elaborate cosmic symbolism of the Egyptian religion. The temple was built in the likeness of the world; the floor naturally represented earth, the ceiling sky; each part was decorated in consonance with its meaning; column- and wall- bases with vegetation, in the midst of which animals were occasionally depicted. The ceiling was blue, bespangled with five-pointed stars. "The vultures Nekheb and Huti, the goddesses of the South and North, crowned and armed with divine emblems, hovered about the central nave of the hypostyle halls . . . the depths of the firmament seemed to open to the eyes of the faithful, revealing the dwellers therein. There the celestial ocean poured forth its flood, navigated by the sun and moon with their attendant escort of planets, constellations and decans."*

Such instances are illimitable. The purest critics, who abhor the sculpture of India because of its disproportionate use of religious accessories, or because of its grossness in Western eyes, show an ignorance and mis-appreciation of an iconography of excelling splendour and mythological richness; where every carved detail is a symbolic attribute, and where even the poses of the hands are stereotyped and significant. There is a wealth of fascination in mythological representation and in the pure humanity of ancient sculpture upon which it is now considered bad taste to insist. Yet if stories are not read into the works of art of the past, and monuments are considered to be monuments to absolute beauty, instead of to a god, to a warrior or statesman, then the motive of ancient art is forgotten for qualities which were unthought. We have yet to learn that the anthropologist rather than the connoisseur is the better qualified to criticise ancient art.

Nor can the copious enrichment, which is sometimes characteristic of ancient art, be produced as evidence of a pure æsthetic sense. The tendency of primitive art, unless there is adequate reason for the contrary, is to labour a surface with as minute filigree as technical skill will permit. The modern view, which is prejudicial to *crowding* and finds in the reduction of ornament to a minimum an indication of refinement, is again an historical heresy. From the wood-carving of New Zealand, the porcelain of China, the brass of Benares, the carpets of Persia, to the reliefs of Khorsabad, the mummies of Egypt, the frescoes of Minoan Crete, and the throne of the Olympian Zeus, the same theme of elaboration is read: it is almost universal in ancient art. The psychology of this *horror vacui*, as it may be called, has never been properly studied.

* W. R. Lethaby, quoting Maspero, *Architecture, Mysticism and Myth*.

Quite apart from the love of the workman in the exercise of his craft, if the *horror* had a place in consciousness, then it was a feeling that extravagance was synonymous with sincerity. Extravagance is a manifestation of wealth and power ; it intensifies the presentation of simple forms, and is, like music and incense, a concomitant dignifying ceremonial. The sculptors of the Hindu temples, consecrating their lives to a meticulous and exacting art, believed they acquired merit, as the Brahmins reciting mantras or as pilgrims journeying to the holy places. The use of the most precious materials and the deliberate triumph over intractable materials must have had the same religious bravado, the same deeply sincere endeavour to make a work conspicuously worthy of its purpose. Geometrical exactitude, for instance, in the orientation of altars and temples, is the analogy of enrichment and derives itself from the same state of mind.

If this be the character of ancient art, what there is of appreciation and criticism must be crude in the extreme. The ancient critic only saw in his works his gods, his heroes—in short, the things he lived and laboured for. Artistic judgment, if such be worthy of the name, was confined to the admiration of size, costliness and cunning workmanship. There is, for instance, constant reference in legend and primitive lore to dimensions and precious materials in all such passages as are descriptive of works of art. The typical paradise-vision luxuriates in golden palaces and jewel-bearing trees, set on mountains of precious stones. The necessity of hugeness or extrinsic value was carried to such an extent that works of art were not worthy unless executed on the greatest scale in the rarest and finest materials possible. The Bible descriptions of the Ark and Tabernacle, Solomon's Temple, Ezekiel's Vision, and the Holy City of the Apocalypse are fair examples of this insistence on measurement and the almost child-like marvelling in " the building of the wall it was of jasper ; and the city was pure gold like unto clear glass. And the foundations of the wall of the city were garnished with all manner of precious stones. The first foundation was jasper ; the second, sapphire ; the third, a chalcedony ; the fourth, an emerald ; the fifth, sardonyx ; the sixth, sardius ; the seventh, chrysolyte ; the eighth, beryl ; the ninth, a topaz ; the tenth, a chrysoprasus ; the eleventh, a jacinth ; the twelfth, an amethyst."*

And such is the Aesthetic of the Ancients.

Primitive life is simple, and its laws are above all things practical. The primitive mind is objective, and its abstractions are presentable only as symbols. Its idealism is moralistic. The Highest is the Good, and the Beautiful is merged therein, undiscovered and unquestioned. The Good and the Useful are ideas that man has made and understood since history began ; the Beautiful, the concept of a Something desirable for its own sake, came to him later. Ancient art, as ancient life, is practical ; and its highest achievements are moralistic. Its excellence consists in its fulfilment of the practical functions of life.

The gradual approximation of art to the Beautiful, which we in our time have been accustomed to accept as the natural order of things, is a psychological development of many centuries. It will presently be our duty to trace its causes and results.

*Rev. xxi, 18.

III.

Our modern exaggerated admiration for Hellenic antiquity has blinded us to the average primitiveness of the Greek. Since the Renaissance he has been exalted divine-like above his peers, and in his art it is sacrilege to consider his conceptions other than the most perfect in the world. To suggest, therefore, that the Parthenon was a temple only, and not a work of art, built by a race of men who flourished in the childhood of civilisation, might be thought eccentric at least, and perhaps ungrateful. Actually, the evidence goes to prove that the Greek was not so far removed from the state of primitiveness in art, already discussed, as to warrant a belief in any highly developed æsthetic gifts in his mentality, or to raise him in this respect conspicuously above the rest of the Ancients. Greek art, according to the view accepted since Winckelmann, had three phases, Archaic, Mature and Decadent. The Parthenon, B.C. 454–438, the supreme example of Greek maturity, is taken as the turning point. These divisions, interpreted according to the foregoing paragraphs, will correspond with particular states of the Greek mind, namely, that down to the fifth century B.C. the Greek was a simple primitive in æsthetic conceptions ; in the fourth and in Hellenistic times he was developing a conscious æsthetic, which Rome ultimately inherited. This transition from the primitive, or ancient, æsthetic to the later will have for us particular interest ; it is the first in the history of Europe, and our modern æsthetic finds its origins therein.*

Greek art at its best was not an Art. It was the expression of a people's Life and Thought, and its excellence was judged by its contemporaries as such. Its temples were the houses of its gods ; its statues were idols. Yet there are students of the antique who, prostrate at, say, the feet of the Hera of Samos, ecstatically propound their truism that representation is the most degraded function of sculpture. If it was not representation, it would be instructive to learn to what other end the Hera of Samos was carved.

Pausanias wrote of the Acropolis at Athens : " All the statues and everything else equally are votive

* Archaistic revivals, e.g., Saïte, in Egypt, 600 B.C., and Nabonidus, in Babylon, 550 B.C., are not European and do not concern us here. But they may indicate similar æsthetic revolutions.

offerings."* When Pheidias gave the Hellenic world its plastic masterpieces, the greatest panegyric accorded him was not that he had created Art but that he had added to the received religion of the State. The grandeur of his Athena Parthenos was the grandeur of Athena herself, embodied in gold and ivory. A legend runs that Zeus testified to the supreme excellence of his image at Olympia by a miraculous sign.† But modern archæology reads false motives in ancient art with tedious perversity. We have, for instance, the controversy over the column supporting the right hand of the Athena Parthenos. Pheidias, it is said on æsthetic grounds, would never have introduced this clumsy expedient. But Pheidias' intention was to represent Athena. The much-discussed column was neither an æsthetic mistake nor a structural convenience but a cult-attribute as necessary to the goddess as her ægis, helmet and shield. Similarly, to give another instance, Fergusson, the architectural historian, is somewhat perplexed by the phenomenon of the caryatid. He presumes to excuse the faultlessness of the Greek taste by adducing an oriental origin for this " very questionable form of art."‡ Students of Greek religion appreciate the caryatid as an attempt on the part of the sculptor to represent the tree-spirit which inhabited the timber prop of the early wooden temples.

A detailed examination of the evidence discloses the Life in Greek art and the absence of æsthetic until its decay. There is actually no word in Greek for Art. Τέχνη is an approximation ; it means rather a *craft* or a *device—art* in our own *old* English sense. Τέχνη only begins to verge on the sense of Fine Art in Plato. The Greeks had a word for Beauty, and Plato has our perpetual homage as a lover of beauty. But, however much it may violate our most cherished prejudices, the Greek associated beauty with ethic, not æsthetic. Like the primitive, he was not too conscious of a difference between the Good and the Beautiful. He could not have comprehended our concept of Art as unique in Life, inasmuch as it is the purer for being useless. The phrase καλοκἀγαθός exemplifies his state of mind to some degree. Καλός, besides meaning *beautiful*, can also be interpreted as *good* or *useful* ; its best equivalent is probably *excellent*. Aristotle, in a philosophic age, when art had all but died, was the first to distinguish formally between the Good and the Beautiful.§ But though it was he who gave currency to the æsthetic terminology of the Greeks,‖ it is curious that he still dissociated Art from Beauty. It was not until the time of Plotinus that the problem of Art as the externalisation of Beauty was dreamed of ; and we are generally agreed that when Plotinus flourished the Hellenic artistic genius had long since disappeared.*

Μουσική is the only word which may be said to have had an æsthetic significance before the fourth century, but it referred to the arts presided over by the Muses. It is interesting that the word often indicated *fitness* or *propriety*. In parenthesis, note that there were Muses of History and Astronomy, which are not arts in our sense ; there were no Muses of the plastic arts. If this omission means that architecture and sculpture, for example, were less truly arts than the *musical* arts *par excellence*, we have further corroboration of the lack of æsthetic sensibility among the ancients in regard to the plastic arts at least. The Greek language shows no consciousness of Pure Art Value, and the only conclusion is that Greek art neither required this value nor knew of it.

Accordingly, the finest appreciation in ancient Greece was ethical, or at any rate related to religious and practical life. Plato, although he is sometimes supposed to have been un-Greek in many of his sympathies, is here typical. The only literary criticism, worthy of the name, prior to Aristotle, made morals its standard ; and the best example of this is seen where we should least expect it—in Aristophanes' *Frogs*. Thucydides applied his ideal of Truth with unprecedented vigour in the writing of history ; yet he was a consummate artist. Evidently the Greeks could create what we have chosen to call Art, without the thought of an art.

Of the references to works of art in the earlier Greek classics none shew any criticisms at all commensurate with our own. The paucity of these references, indeed, shews some lack of a purely artistic interest. But what references there are seem to be childishly simple. Greek curiosity began and ended with an account of what the work represented, what it was made of, and what its size was. Herodotus is concerned with material value and dimensions. He travelled perhaps more extensively than any of his contemporaries ; he was the contemporary of Pheidias, and, simple as he was, must have been conversant with all the brilliance and culture of Periclean Athens, yet he did not attain to any appreciation more refined than the following : " In the temple is a sitting figure of Zeus, all of gold. Before the figure stands a large golden table, and the throne whereon it sits and the base on which the throne is placed are likewise of gold. The Chaldæans told me that all the gold together was eight hundred talents in weight. . . ."† And that is a fair sample of Herodotus. To him, as to all Greeks, representation was the only object of sculpture. Socrates, " the wisest of the Greeks," and himself trained as a sculptor, was conscious of no other object in sculpture ; he was the

* Pausanias, *V, xxi.*
† Pausanias, *V, xi.*
‡ Fergusson's *History, I, iii, ch. ii.*
§ *Metaphysics, XIII,* 3. *Vide* Encyclopædia of Religion and Ethics, Article *Aestheticism*, for moralistic view of Greek Art.
‖ Ἁρμονία, &c.

* Butcher's *Aristotle's Poetics.* Intro.
† Herodotus. *I,* 183.

junior of Pheidias by some twenty years. If Socrates was the first of æstheticians, and amateurish at that, it is significant that Greek art had reached its zenith before it had entered into the curiosity of men to ask what Art was. Plato founded his antipathy to works of art on the score of their being *copies*. Aristotle made representation (*μίμησις*) the end and aim of Art, although it was representation of a very expansive character. Even music, which to-day is considered the purest of the arts because it is the least representational, conformed to the mimetic doctrine. "In rhythms and melodies," said Aristotle, "we have the most realistic imitation of anger and mildness, as well as of courage, temperance and all their opposites."*

Descriptions of sculpture and painting in the Classics are, therefore, concerned with representation. Hesiod's Shield of Heracles and Homer's Shield of Achilles are superb examples. The greatest merit of a statue was that it seemed to live, and of a painting that it deceived the beholder by its realism. There are scores of legends to this effect. A statue of Heracles by Dædalus had to be tied up to prevent its running away. In the Greek Anthology, Praxiteles' Niobe is given as saying :—"From the life the Gods made me into a stone, and from a stone again Praxiteles wrought me into life." At Syracuse there is said to have been a statue of a man limping, and "the spectators seemed themselves to feel the pain of his ulcers."† That sculptural portraiture was intended to be photographically realistic is true by the great importance attached to the discovery of casting the features from life. Among painters, the story of the competition between Parrhasios and Zeuxis is well known. The one painted grapes, which the birds came and pecked at ; the other seemed to cover his picture with a curtain, which itself was discovered to be the picture. Accordingly Zeuxis, because he had deceived men, was awarded the prize, whereas Parrhasios had only deceived the birds. The effect of a picture on birds must have been a regular criterion of excellence. Snakes were painted which frightened the birds away, and we are to believe that this device must have become the scarecrow of antiquity. So the last painting was representational, and according to Pliny the Elder the highest aim of a painter was "to produce about his figures the illusion of ambient space."‡ Often representation was carried to the extent of pure animism. The statue of Theagenes, the boxer, was thrashed by his rival, and when the statue fell and killed him, it was indicted for murder and thrown into the sea.§ The legend of Pygmalion and Galatæa, although late in its origin, may conveniently epitomise the antique point of view in sculpture. Except for the love of anecdote and the marvellous, which are the principal interests of some minor writers, the above is about the extent of Greek artistic criticism. The notion of formal self-conscious beauty never appears.

To the non-representative art of architecture the Greek attitude is, therefore, difficult to define. Evidently architecture, as architecture, did not interest the Greek ; it more nearly approached our concept of *engineering*. Its existence does not, therefore, invalidate the mimetic doctrine. On the whole a temple, for instance, was the house of the God, and only the God concerned the Greek ; tombs were memorials, and only the buried dead concerned the Greek. Remarking on the use of architectural similes in the treatise of Longinus *On the Sublime*,* Prickard says : "Architecture, perhaps, did not greatly stir the Greek mind ; one of its purposes was to provide a framework for beautiful carving or pictures ; but in itself it was merely useful. Nor was it far otherwise in Roman ideas. The imagery repeatedly drawn from walls and their constituents in this treatise touches on something new." Even so late as Pliny's description of the Mausoleum, it is the sculpture which attracts most attention.

The only possible direct example of *taste*, in our sense, which Greek architecture provides is the architectural refinement. The optical correction theory held good since the time of Pennethorne and Penrose, but this has been discredited by recent research workers. Goodyear, still presupposing deliberate æsthetic sense in the mind of the Greek architect, advocates the view that the Greek preferred curves and systematic irregularities. A. B. Cook, in the face of this scholastic wrangling, suggests that the simplest solution is the most possible—that the origin of refinements was practical, not æsthetic, and that drainage may once have been their purpose. But this only accounts for horizontal curvature. Our own context here might suggest that there was some symbolism evinced which the usual conventionalism of ancient art had perpetuated. The Greek architect, it is possible, might have desired to represent the absence of straight lines in Nature, or had reproduced the irregularities of the prototypical wooden construction. It is unfortunate that except for one obscure reference in Vitruvius, there is no mention of refinements in the extant Classics, and the whole subject is one where argument is at present useless.

Nor is it likely that the canons of the Greek sculptors had an æsthetic purpose. Polykleitos desired to represent in his canon the perfect human body—that is, the body which could give the best account of itself at the

* *Politics*. *V, viii*.

† Pliny. *Natural History*. *XXXIII, ii*.

‡ This and Note † immediately above are from Pliny's *Natural History*, which the present writer can be excused for using here, since Pliny's own references were generally Greek, and represent Greek opinions.

§ Pausanias. *VI, xi*.

* The date of Longinus is uncertain ; but he was certainly not prior to the first century A.D.

Olympic Games. His must have the same synthesis from which Tait-Mackensie, the American sculptor, produced his ideal human form from some hundred Yale and Harvard athletes. The canon is only evidence of the persistence of *fixed types*, a principle which pervades Greek art, literature, drama and Greek life generally.

Greek art lost its perfection so soon as it became conscious of art values. The new consciousness is already beginning in the Periclean age. The scene was Athens then, and its growth was remarkable for rapidity. The Parthenon, as the symbol of united Hellas, and as such the avowed policy of Pericles, was thereby acquiring other functions than the simple cult of Athena. Pericles himself, in his famous remark in the Funeral Oration : " We study beauty in her simplicity " must have felt the value of the beautiful for its own sake. Praxiteles and the post-Pheidian artists may have realized his view. But it is certain enough that Aristotle and his pupil, Alexander the Great, first shewed new ideas fully and universally in the course of formation. Alexander must have genuinely appreciated many of his teacher's enthusiasms, and in his journeys of conquest must have taken a scholar's interest in what he saw. His sending of specimens home to Aristotle for the writing of the *Natural History* is probably typical. In his inclination to adopt what he most admired for his own purposes, his behaviour is reminiscent of Charles VIII in that monarch's invasion of Italy ; and his attempt to apply the delicate architectural forms of the Greeks to his great city schemes marks the inception of architecture as plan and structure with a stylistic form added. Lysippus, the sculptor of the time, was diligently revivalistic. He was the author of the first sculptural allegory. His own *canon* was intended to improve on that of Polykleites. His busts of Alexander are exhibitions of æsthetic affectation.

One unmistakable sign of the change is manifestly the consciousness of history and the admiration of the past. The Parthenon, as a memorial to the Persian invasion, shows a consciousness of history, and thereafter there must always have been a reversion to the glories of Pericles. The change in the æsthetic standpoint was becoming more consolidated in Rome, who admired Greece and aped Greece. Possibly the transition had already been effected in Alexandria and Pergamum, both descendants and admirers of Hellenic culture.

Roman art was Greek absolutely. In sculpture, Roman admiration for the original Greek masterpieces caused their unlimited reproduction for the embellishment of Roman buildings. It is noteworthy that almost all our specimens of Greek sculpture have been obtained in their Roman reproductions. It is not surprising that we should have the phenomenon of a revival of Greek sculpture in the quaint, but insipid, archaisms of Pasiteles and his school, which was enthusiastically welcomed by contemporaries.

Roman architecture historically is a direct translation of the Greek. The translation was rendered practicable from the nature of the earliest Roman architecture, which was wooden in construction with terra-cotta ornaments affixed. This principle made the application of Greek forms to a bare constructional core an unavoidable process. The principle served at once to distinguish two elements in architecture, construction and ornament, which never before in the history of the art could have been so treated. Hence Rome initiated the idea of architecture as *decorated building* and gave us the *façade* and *elevation*, which dominate up to the present time. Rome was establishing in Fine Art a new mentality that desires forms, neglectful of their meanings and motives.

It is enough to notice the respect with which the Roman conquerors treated Greece. It had always been the acknowledged right of a conqueror to plunder the treasures of conquered provinces. Probably the Persians represent the climax of that right in the huge halls which they built to house their trophies and the more visible wealth of empire. The spoils of war were accumulated for their intrinsic value and served the purposes of capital and self-gratulation. But Rome, if she enriched herself by her expeditions in Greece, did not covet her Greek trophies because they were materially precious, but because they were Greek—that is, because they had a value for their own sake, an artistic value. So Marcellus proudly displayed the spoils of Hellenic Syracuse to the Roman populace. The generals Mummius and Sulla set the fashion of transporting Greek works of art wholesale to Rome. Augustus and the Emperors succeeded to their example, and statuary became as much a part of the pageantry of military triumphs as captives and slaves. Nero's Golden Palace was a treasury of Greek art. Caligula even desired to remove the Olympian Zeus to Rome and substitute his own likeness for that of the god. Similarly, Roman Emperors devoted much care to the restorations of Greek shrines, and made offerings of their own to shrines of special sanctity. Hadrian is repeatedly praised by Pausanias for this kind of pious generosity.

Roman Philhellenism had many peculiar corollaries, one being the littérateur and connoisseur, the Epicurean in letters and art, who cultivated Greek manners. The Roman patrician, with his Greek possessions, would assume inevitably all those qualities now associated with modern collectors of antiques and Old Masters. Lucian, originally a sculptor, was the complete connoisseur and critic. His synthetic construction of the ideal Panthea is reminiscent of some of our modern artistic eclectics. Quintillian has the same

tendencies: as also Cicero, Varro and many lesser writers. The most perfect types of this early connoisseurship are the Plinies and Vitruvius.

Pliny the Elder's opinions on art are found in his *Natural History*. Sculpture and painting concern him most. Like the modern critic, he loved to theorize. He had also a definite consciousness of a History of Art, a consciousness naturally born of theory. He believed Art was for contemplation, for he wrote: "We need leisure and profound stillness for the admiration of art."* These are ideas which would have startled the Greeks, whom he idolized so much. Pliny the Younger, in his Letters, shows himself at once to be the polite and elegant dilettante. The letter which describes a recent purchase, a Corinthian bronze, maintains that attitude perfectly.† In another letter, which describes the aspect from his Tuscan villa, he indicates a real æsthetic appreciation of landscape, which is unique in antiquity.

Vitruvius has recently been much controverted, and, as is generally the fate of all idols sooner or later, serious attempts have been made to discredit his authenticity. That he was an amateur is possible from the fact that, for all his parade of engineering and building knowledge, he omits to explain the arch and the vault, the great features of Roman architecture. But, whatever be his justification and excuse as an architectural writer, he is important as being the only architectural writer of antiquity whose works are extant. His laws and proportions of the Orders show a thoroughly theoretical mentality. He is devoted to his Greek authorities. He is an archæologist and recommends the study of archæology. "Unless acquainted with history," he writes, "the architect will be unable to account for the use of many ornaments which he may have occasion to introduce."‡ Hence architecture becomes the study of scholars, and Vitruvius goes so far as to prescribe moral philosophy as part of the true architect's training. He recounts with some ostentation his own thorough education, though his barbarous style as a writer does not always vindicate the allegation. He differentiates the function of the architect as the creator of beauty from a mere master-builder. The beauty of buildings, according to him, gives merit to the architect, "on account of the proportion and symmetry which enter into the design, but the building and the magnificence thereof are respectively given by the workmen and the money spent."§ Furthermore, as particularly recalling modern architectural practice, he recommends the study of geometry, "whereby delineations of buildings on plane surfaces are greatly facilitated."¶ He describes the use of plans and elevations, the latter "to be slightly shadowed to show the forms of the intended building." He knows what perspective is and mentions the theory of the vanishing point. In short, his resemblance to the modern architect is astonishing.

Together with Vitruvius, it is interesting to cite Pausanias. From Pausanias, as from Pliny the Elder, evidence has already been obtained for the primitive Greek view; for Pausanias was a primitive at heart, and his chief interest in art was mythological, as his descriptions show. Herein he resembles Herodotus. Yet he was the contemporary of Hadrian, and the new æsthetic is not absent from his famous *Description of Greece*. The beauty, elegance and decorative nature of works of art for their own sake are notions which are common to him. He sometimes tends to decry the contemporary for the antique in true modern fashion, while at other times he speaks of the rudeness of the antique. He accepts the function of the art critic and has some consciousness of both styles and art-history.

A digression into the appreciation of Natural Beauty by the ancients reveals an analogous æsthetic revolution. It is noticeable that the female nude was never considered a subject worthy of representation for its own sake until the decline of Greek art. Praxiteles' Venus is the first executed by a Greek sculptor, and even here the sculptor is constrained to find an excuse for nudity by representing the goddess at the bath.* Kephisodotus, the father of Praxiteles, was the first sculptor to represent a baby, an example which Praxiteles himself followed in the Hermes. Eros was normally an adolescent youth; and the Cupid-type was created and popularized in a later age. It is evident that until the fourth century, sculpture was associated with cult, had no liberties as a Fine Art, and, therefore, never represented women and children for their own sake.

Nature supplies primitive art with motives, but only by reason of its relation to religion and symbolism. At the same time, metaphors taken from natural phenomena pervade Greek literature from the earliest times; and in Homer, for example, one recognises observations which continually belie the legend of the poet's blindness. But this does not necessarily indicate an æsthetic appreciation of nature. How far the Greek admired his groves and temple precincts cannot be estimated, though mere love of seclusion could not have been the only cause of Plato's holding his School in the Academy, or of Euripides' retirement, Thoreau-like, into the wilderness. Nevertheless, the

* Pliny. *Natural History*. *XXXIII to XXXVI*.
† Pliny. *Letter III, vi*.
‡ Vitruvius. *I, i*
§ Vitruvius. *VI, xi*. ¶ Ibid. *I, i*.

* The Ludovisi Throne, though its meaning is doubtful, is obviously connected with cult. The presence of nudes here and elsewhere, prior to Praxiteles, does not alter the course of our argument.

sites of Greek temples were not selected for looks; they were sacred from remote antiquity. "Alike on the cape of Sunium, the cliffs of Selinus, the Acropolis rock of Athens, on the plain of Paestum and the muddy flat of Ephesus, the Greeks indifferently founded their great temples."* The Phaedrus represents Socrates as saying: "Trees and country places have nothing to tell me; men in the city have." The Roman Lucretius thought mountains were waste ground. Nature by the Greeks, like their arts, is judged ethically. She is good when sympathetic to man. Rivers are friendly as irrigating agencies, but hostile in flood. Nature is haunted (ζάθεος), not beautiful; and the Greek only delights in the nymphs and fauns who impersonate his rivers and trees. The same animism of the primitive is co-extensive with Greek life and thought.'†

Aristotle's *Natural History* is the real beginning of an interest in Nature which is neither religious nor anthropocentric. The Nature-sensitiveness which appears as early as Sophocles is not of this order.‡ Theocritus, the Alexandrian, is the first of pastoral poets, and he flourished in the third century B.C. The Romans have instinctive sympathy with Nature, which may have been the survival of early farming memories in men who had since become weary of warfare and town life. The Roman country villa has no analogy in Greece. We have already mentioned Pliny the Younger in this connection. "You would imagine," he writes, "that not a real but some painted landscape lay before you, drawn with the most exquisite beauty and exactness; such an harmonious and regular variety charms the eye which way soever it throws itself."§ Seneca proposed to visit the wild districts of Bruttium and Lucania by way of change and relief. Lucian refers to the comfort (παραμυθία) of seeing the country. Roman art in the wall-paintings of Pompeii and the catacombs reveals a search for beauty in natural forms. There was a painter, contemporary with Augustus, who, according to Pliny the Elder, introduced a delightful style of decorating walls with representations of villas, harbours, landscape gardens (*topiana opera*), sacred groves, woods, hills . . . . in short, any scene that took his fancy."¶ The Corinthian acanthus and the arabesque show advances in the same direction.

Rome evidently produced an æsthetic comparable with our own.

IV.

The advent of the Middle Ages produced strange contrasts, particularly in the matter of continuity of Roman traditions. In some respects the break with Roman traditions was so slight as almost to suggest their interrupted continuity up to the Renaissance. The Romanisation of both Church and State and the Classical survivals in literature, philosophy and intellectual culture generally are phenomena which histories do not sufficiently emphasise. The break with what may be called Paganism was, however, more definite; though even here the adaptation of numerous pagan ceremonial forms gave the externals of Christianity a less revolutionary aspect.

Roman art did not survive the dissensions of her last centuries. The new styles, Romanesque and Byzantine, indeed, had definite links with antiquity, inasmuch as no art is wholly new. Classical models, for instance the basilica, were used not out of æsthetic admiration but out of necessity and convenience; even decorative details were developed by unskilful and ignorant workmen, ostensibly reproducing classic forms. The great mediæval arts were in many ways the results of barbarians solving problems which never beset the ancients, often using materials which the ancients would have despised, with the old Roman types of basilica, dome, mosaic, etc., as their proper craft traditions. The occasional conversion of ancient monuments to the service of Christianity, and the pillaging of the ancient palaces and forums for their materials, gave that tradition obvious encouragement.

But the idealism of art was totally reversed. The Christian was a primitive in æsthetics. Architecture was no longer a Fine Art, and sculpture again was representational. The highest acquisition of the mediæval builder and maker of images was not to create Art but to glorify God; the æsthetic of formal beauty had completely disappeared for the last time in the history of Europe. To the Christian, and to the early Greek, a temple was a temple; a statue was a personage, and its value was in proportion to the value of the personage, even though Praxiteles had been its sculptor. Cathedrals were built to accommodate worshippers and to be the scene of religious rites, not to adorn cities; sculpture and painting became the Bible of the illiterate. There was a legend that Pheidias was a demon who turned men into stone—so far, indeed, had the appreciation of his art been lost. Similarly the æsthetic appreciation of Nature disappeared. The sensibility to Nature was teleological, a pure religious adoration, or was a crude animism which associated natural phenomena with the dominion of evil demons. Natural Science only amounted to some superstitious lore plus the commentaries of Aristotle and Galen.

The Christian, triumphantly oblivious of artistic beauty, was therefore not slow to give proof of his hatred of pagan works. We have mentioned occasional survivals. Generally, Constantinople and a few cities of the Byzantine Empire were the single exceptions

* W. R. Lethaby. *Architecture, page* 242.
† Vide W. R. Hardie. *Lectures on Classical Subjects.*
‡ e.g., Chorus describing Kolonos in *Oedipus Koloneus.*
§ Pliny. *Letters. V, vi.*
¶ Pliny. *Natural History. XXXV, i.*

where the artistic remains of Classical civilisation were cherished and protected. Even the Olympian Zeus found a haven in the city of Constantine, and indeed the traditional likeness of the bearded Christ may have had in that masterpiece of Pheidias its real prototype. But the systematic destruction of pagan shrines and relics, from the time of Theodosius onwards, is the rule; and history describes for us a long chapter of frenzied vandalism, which our own enlightened but unsympathetic age is far too ready to condemn. Gibbon gives a fine account of this misdirected exercise of early Christian zeal. For instance, the Christian registered his abhorrence of non-Christian art with such methodical energy that a great school of painters like the Manichees, was annihilated, except for some very rare specimens which modern archæology has accidentally discovered. The Marcus Aurelius monument now in the Capitoline Piazza at Rome was only preserved because it was thought to represent the Christian Emperor Constantine.

Practically all the great figures of mediæval religion, therefore, took a Puritan view of the Fine Arts. Tatian, in a treatise which is typical, devotes a passage to enumerating the various criminals to whom the pagans have raised statues, which he exhorts his brethren to destroy and bury, that the memory of their crimes may be the more easily forgotten. Tatian's appreciation was that of mediæval Christianity as a whole; the same feelings are expressed by writers and preachers from St. Gregory to Savonarola. The prejudice against the sensuousness of ancient art has in a small measure persisted till to-day.

Of their own arts mediæval writers are "disappointingly jejune."* Evidently, as for the ancient Greek, Fine Art, apart from its meaning, was not sufficiently important a thing to be discussed. Yet here and there passages of some grandeur do occur, and they are evidence first of the religious fervour of the mediæval mind, and secondly of the didactic and illustrative nature of its arts. "If the faithful soul chance to behold the effigy of our Lord's passion expressed in all its lineaments, then he is pricked to the heart; if again he see how great tortures the Saints endured in their mortal bodies, and how precious a prize of eternal life they won, then doth he receive encouragement to a better life; or, beholding how great is the joy of heaven, how awful the torments amid the flames of hell, then he is cheered with hope for his good deeds, and smitten with fear at the thought of his sins. Work, therefore, now, good man, happy in this life before God's face and man's, and happier still in the life to come, by whose labour and zeal so many burnt-offerings are devoted to God!" Yet at the same time this writer is not forgetful of "the light streaming through the windows, the priceless beauty of the glass, and the variety of this most precious work."

Professor Prior says of Gothic sculpture: "The arrangements and motive of its subjects were outside any cult of beauty, or allegiance to any æsthetic philosophy . . . . their function was exhortation; the meaning of their works was the soul that ennobled them; the purpose was to teach all that was best worth knowing, but with secondary thought as to pleasing the eye, and with no idea at all of tickling the æsthetic fancy of the connoisseur."* He also quotes from St. Gregory: "What writing is for those who can read, painting is for the uneducated, who can only look."* And from a thirteenth century French prelate: "Pictures and ornaments in churches are the true teachings and scriptures of the laity."* The whole scheme of ornamentation of the French cathedrals was intended to typify the Christian cosmos. It was a plastic encyclopædia of contemporary thought.

Mediæval art was Exposition and Faith, and imposed upon it was the same strict conservatism of the ancients. The second Council of Nice decreed in 787 A.D.: "The execution of images is not the invention of painters, but is proved to be the legislation and tradition of the Catholic Church, and of our ancestors who built."*

The modern concept of deliberate Design was unknown to the Gothic craftsman. He worked with the sublime faith that can leave designs to take their own course. Beauty in his cathedral was achieved by slow perfecting of parts, mastery of workmanship, economy and tradition. To imagine that the west front of Wells or the nave of Salisbury were designed for an æsthetic effect is a ridiculous misrepresentation of the true spirit of those masterpieces. One might as well think the spider weaves his web for our personal delectation. There is in them the greatness and wonder of Karnak; and until the modern necessity of an æsthetic is obsolete, the real source of Gothic achievement will never be understood. Gothic is not an Art. This was the mistake the Romantic Revival made. Gothic was the creation of men who did not hesitate to burn the priceless marbles of the pagans for lime, and who would without compunction destroy their own treasures of one generation to rebuild them in the next. Gothic is essentially a ritual. Like the Catholic Mass, its every detail contains a meaning patent to the initiated; it is a sacred story pantomimically presented for the edification of the faithful. "The fairy architecture, the glory of stained glass, the might of the bells, the sweet incense, the organ music, and the splendour of the altars and vestments, all contributed to the most marvellous of dramas—mediæval worship."†

* G. G. Coulton. *Social Life in Britain from the Conquest to the Reformation. Section XIII*, from which the quotations following are taken.

* E. S. Prior and A. Gardner. *Mediæval Figure-Sculpture in England.*

† W. R. Lethaby. *Architecture*, *p.* 210.

V.

Conclusion.

The whole problem resolves itself, as is usual in such discussions, into the everlasting antithesis of the Idea and its Expression—or, in the approved nomenclature of æstheticians, of content and form. In a true work of art, content and form are so completely merged that an attempt to differentiate them by analysis in effect destroys both. Whence possibly the only definition of Art is the Measure of Success of this merging, the precision with which an image is expressed. The differentiation of content and form is ultimately a misuse of the naturally objective and analytic tendencies of our reasons, and the chief value of the Crocean philosophy is to have proved this for us. But art must have an inspiration, and the course of centuries according to our evidence has changed the centre of artistic inspiration from content to form and given us æsthetic conceptions which once did not exist. The extreme modern view advances so far as to declare that the content of a work of art has no real importance ; sculpture and painting are to consist of pure design, a system of patterns, which ultimately should be equally expressive upside down ; their last and most depraved function is representation ; they are degraded if catalogued with titles. After the law and principle of music, which is pure and non-representational, the arts must strive, and, says Walter Pater, " one of the chief functions of æsthetic criticism, dealing with the products of art, new or old, is to estimate the degree in which each of those products approaches, in this sense, to musical law."* Compare this passage with one of Aristotle's on music, previously quoted. Yet by a strange irony the extremist of modern times idolises more and more the primitive and archaic, whose absence of pure design and pattern we have been at some pains to prove.

Art to the ancients was Life, and all that Life can mean. Works of art were not beautiful in themselves ; they were beautiful if they represented beautiful things. Beauty of form was the accidental and unconscious accompaniment of artistic creation. It was "what the Greeks would call '*επιγιγνόμενόν τι τέλος*,' words hard to translate, something between a by-product and a supervening perfection, a thing like—as Aristotle for once beautifully says of pleasure—' the bloom of youth to a healthy young body.' "† In this Essay we have endeavoured to examine what justification we have historically for the persistent belief that beauty can reside in a *design*, in a particular fold of drapery, the pose of a limb, the outline of a moulding or the juxtaposition of colours, instead of that beauty resides in the object itself for what it represents or fulfils—how far it were better to study a cathedral as a place of worship or as a lofty filing nave, and a crucifix as Christ on the Cross, with all that that can mean to a devout heart, or as the embodiment of certain rhythms, proportions and conformations of mass.

Art evidently is a value which is assumed by objects whose original purpose has been outgrown and forgotten. Nature becomes beautiful when the animism of primitive belief disappears. To-day we glorify the sunset æsthetically ; our fathers deified it and said their prayers to it. Likewise architecture, sculpture, and works of art generally become beautiful when they have lost religious prestige. In a more simple case, such a thing as military ceremonial is æsthetic in so far as it is useless in the circumstances of war, which originally caused it to be.

The problem of respective gain and loss to us in the æsthetic revolution is somewhat irrelevant to our argument. But the following observations may not be unnecessary.

We must ourselves be judges of the value of the æsthetic sensibility. If we have lost the faith—and, if you will, the superstitions—of our fathers, our lives have been enriched with a substitute, to whose enjoyment our own intimate experiences can bear witness. But the claim of the æsthetic sensibility to remain with us must be balanced with its modification of the unity and creative gifts of our aboriginal selves. We have found in recent centuries an inestimable treasure, but we have apparently lost the power of replenishing it. We now labour after *effects* ; we restlessly aspire to *character* and *originality*. The mediæval craftsman would have told us : " Seek ye first the kingdom of God, and these things shall be added unto you." In consequence of our opposition to the simple representative truth, which infuses ancient art, we wage a constant Battle of Styles and Standards of Taste The history of French Impressionism would have been unimaginable in the days when a picture of Athena was Athena, and Zeus was Zeus, and nothing else. Moreover, by an insistence on design and form, our artists are in danger of speaking in a language not understood of the people, many of whom are primitives still and to whom ultimately will be given the right of judgment, even as they were in past ages of fertility and inspiration. The new æsthetic has made art a luxury and the artist a parasite ; he ignominiously apologises for his existence by expatiating on the " Necessity of Art."

There is a subtle irony in the modern attitude. It judges ancient art by æsthetic standards—and therefore by unintentioned standards. Equally must its own excellences be unintentioned and unrecognised by its creators. Renaissance art tried to be Roman, but unwittingly produced a spirit of its own, which we now recognise and extol. The Neo-Gothic tried

* Walter Pater. *The Renaissance. The School of Giorgione.*
† Jane Harrison. *Ancient Art and Ritual.*

to be Gothic and failed. Yet we are finding their works praiseworthy for other reasons than their Gothicism. Our most debased periods, perhaps, are entitled to some respect. Even Chantrey and Gibson might have enviable qualities, if only it was the sincerity of their work and no more. Canova, Thorvaldsen, and Flaxman have genuine admirers, but not because they were imitators of the Greeks. Modern designers are fanatical students of the archaic. But their works are not the better for it. If their works have merit it is because they unconsciously bear the stamp of their makers' personality and the age in which they live. Incidentally our finest products to-day are those that have not yet acquired the aristocratic status of Fine Art. There is a progressive school of critics who find æsthetic satisfaction in pure engineering structure, in motor-cars, aeroplanes, and the ordinary things of life. Their view may or may not be right—but it is more nearly the view of the ancients than any other. Is it that the æsthetic sensibility is a dangerous illusion? Were it not for its power to-day this conclusion would be pardonable. We are the heirs of the dilemma, that so soon does a workman become conscious of art, so soon does his work cease to be artistic.

If Art is History's picture-book wherein we may read the life-history of men, our modern æsthetic chaos would be the symptom of our modern spiritual and intellectual chaos. If fault there be with our arts—and many are agreed that they are not as resplendent as in the past—it is not in the loss of crafts, or in commercialism, which we habitually execrate. The fault is in ourselves. We have lost the primitive genius of olden time, and, study as we will, it shall not be reproduced by artists. A new cycle of culture, analogous to that which began its course in the first century of our era, in an æsthetic atmosphere we have seen to be similar to our own, could, and maybe will, recreate vital artistic traditions, which shall have a meaning and an appeal to men. Perhaps the æsthetic sensibility, as the final vibration of a moral nature, the old age of reverent memories, may yet be the promise of a resurrection.

We have in the course of this Essay studied the primitives and the ancients. We have established the extent of their æsthetic consciousness. We have indicated the purpose of their arts and the relation of their arts to life. We have established the complete revolution in the æsthetic consciousness of modern times. The conclusion is that Art, far from being the eternal necessity and birthright of human nature, is new to human nature; that to admire the arts of the past for their own sake rather than for their meanings has not the support of History; that it is not just to attribute to the ancients an æsthetic which it is not possible for them to have possessed; and finally that if we are to cure our artistic pessimism and again produce great architects, sculptors and painters, Art itself will be less of an aspiration, and Man once more will be considered worthy to be studied and represented.

The New Zealand Institute of Architects

ITS HISTORY AND DEVELOPMENT.

(*A contribution sent by Mr. D. G. Johnston, Secretary of the New Zealand Institute of Architects.*)

THE settlement of the British race in New Zealand, begun in earnest in the year 1840, covers little more than the span of a lifetime, but in that short space of time the Dominion has evolved from a few scattered whaling and missionary stations, firstly as a Crown Colony, then as a self-governing colony of several provincial councils, and finally as a strong self-governing Dominion of the British Empire with a population exceeding one million.

The early settler was concerned only in providing the most primitive dwellings and business premises. But those early buildings, in all their rudeness, often possessed a charm, simplicity and sense of fitness which made them more to be desired than some later and more pretentious erections. They were built usually of the material of the country and to fulfil the needs of the people. The earliest " Colonists' Guides " contained simple plans of two-roomed houses, and the military operations necessitated the provision of barracks and store buildings in addition to the houses for offices and government officials. In these buildings hewn and sawn timber, clay and wattle and daub with thatched and shingle roofs were the materials frequently in use. There was but little stone available, but in certain parts that was used, and bricks for chimneys were soon manufactured. In some cases wooden buildings were shipped out in sections from England and erected.

This period of primitive simplicity was followed by attempts at more pretentious buildings of wood, frequently adorned with fretwork, on which the whole ingenuity of the carpenter was exercised to obtain an obtrusive complexity and splendour of effect. Much of this was due to the introduction of books of meretricious designs from America. Most of the business premises, however, and some of the houses were designed with a degree of taste, frequently on classic lines, and were usually built of wood. Many of these were the work of the earlier architects.

With the rapid development of the Colony, following the period of the gold rushes, there came a demand for improved buildings, and a certain limited scope for architects. At first, members of the profession pursued a purely individual path, although the formation of various associations of architects commenced as early as the year 1880, when an association was formed in Auckland ; but a common ground of interest gradually developed in the necessity for standardising the conditions of contract. This was the main purpose of a conference called in Wellington in October 1905, when architects attended from Wellington, Auckland, Canterbury, Otago and Southland, all the important centres being thus represented. Mr. Wm. C. Chatfield, of Wellington, who had been a vigorous advocate of the organisation of the profession, was elected to the presidency, and it is pleasing to record that the veteran is still an active member of the New Zealand Institute of Architects.

It was explained by the chairman that the meeting was called to constitute a New Zealand Institute of Architects, so that the profession could be properly represented when meeting the builders of the Dominion to discuss modified conditions of contract. The proposal was unanimously adopted, and the Institute commenced its career with the following officers :— President : Mr. Wm. C. Chatfield (Wellington) ; Vice-presidents : Messrs. E. Bartley (Auckland), S. Hurst Seager (Christchurch), F. Penty (Wellington), F. W. Petre (Dunedin), and R. Marshall (Southland) ; Hon. Secretary : Mr. Wm. Crichton (Wellington) ; Hon. Treasurer : Mr. A. Atkins (Wellington) ; Members of Council: Messrs. Thos. Mahoney (Auckland), Wm. Turnbull (Wellington), J. Collins (Christchurch), J. L. Salmond (Dunedin), and Chas. H. Roberts (Southland). Subsequently the representatives of the Institute met the builders at Timaru and conditions of contract were framed. There was a satisfactory adjustment at the time, particularly from the point of view of the interests of the building owner, as represented by the architect, but the question of conditions persists to this day and has been the subject of very strong controversy at times.

In 1909 the Institute resolved to publish a Journal, and this was issued quarterly under the editorship of Messrs. R. F. Bacon, A.R.I.B.A., and C. F. B. Livesay. It was subsequently found more desirable to issue an annual volume of proceedings, which was compiled by the secretary, the late W. Beauchamp Platts. The literary side of the Institute's activities has since developed in a very satisfactory manner, a bi-monthly being published under the editorship of Mr. C. R. Ford for two issues, and then continued by Mr. F. E. Greenish, A.R.I.B.A., who still retains the position. In August 1912 the Institute was affiliated to the Royal Institute of British Architects and thus became an " Allied Society."

With the growing importance of the profession in a rapidly developing country, architects recognised that their organisation should possess some more definite standing than that provided by registration of the general character under the terms of the Incorporated Societies Act. The Government was approached, with

a request that an Act be passed conferring definite powers upon the New Zealand Institute of Architects. A deputation interviewed the Hon. W. F. Massey (Prime Minister) with this object in August 1912. It was introduced by the Hon. A. L. Herdman, then a member of the Cabinet, and was supported by Mr. Alfred Atkins, President of the Institute. The Prime Minister was completely sympathetic with the aims of the deputation and he undertook to bring in a measure as suggested.

On the circulation of the proposed Bill many objections were made, principally on behalf of local bodies, who considered that its provisions would render their engineers liable to prosecution if they designed any building. A separate association of architects in Wellington also submitted objections, and the Council of the Institute conferred with representatives of this Association. The result was an agreement on the principles of the measure, and a decision to amalgamate the Architects' Association with the New Zealand Institute. Thus the profession faced the position in united fashion. It was a wise move, for opposition to the proposed Bill was fairly extensive, owing to the great influence exercised in Parliament, not only by representatvies of local authorities but by the builders. The cry of " close corporation " was raised, but the answer to this was that Parliament had already given statutory recognition of a similar character to the Medical Association, the Dental Association, the Society of Accountants, the pharmacists and surveyors, while even the plumbers had been controlled under powers of a statute. The Bill was in charge of the Hon. A. L. Herdman, who proved himself an able advocate in face of strong opposition from some sections of Parliament. Important modifications were made in the measure, otherwise the strength of its opponents would have been overwhelming and the chance of statutory recognition would have been lost. The concessions made under strong compulsion caused disappointment to the profession, and it is still one of the objectives of the Institute that amendments to strengthen some clauses of the Act should be secured. A weakness of the New Zealand Institute of Architects' Act, which was passed in November 1913, is that no penalty is provided for a person who practises as an architect, so long as he does not represent himself to be a registered architect. The profession in New Zealand has only to trust to the discrimination of the public, who should realise that all competent architects are members of the New Zealand Institute.

The chief value of the New Zealand Institute of Architects' Act lies in the control which it gives over the qualifications of those who wish to enter the profession in New Zealand. Specific power is given in the statute for the Council of the Institute to make arrangements with the New Zealand University for the conduct of examinations for the degree of Batchelor of Architecture, and it is also obligatory that a Committee of Architectural Education be appointed annually to deal with the education of students in architecture, and to conduct (by examiners approved by the Council) such examinations as may be required by the regulations of the Institute. No person can now secure admission to the Institute unless he has qualified by examination, either of the N.Z. Institute or of the R.I.B.A. In the latter connection it is interesting to note that a large number of New Zealand's practising architects have been trained in England or have visited England for the purpose of study and qualification.

Provision was made in the Act for the registration of architects, the principal clause authorising the registration of all those who had, for three years prior to the passing of the Act, been *bona fide* engaged as principals in the practice of architecture in New Zealand. Power was also given to include, in due course, those who at the time of the passing of the Act were studying for the profession. The administration of this section was left to the discretion of the Council of the New Zealand Institute. The first annual report after the completion of registration under the Act showed that the roll comprised the following :— Fellows, 135 ; Associates, 179 : totalling 315 members. The present position of the membership is as follows:— Fellows, 114 ; Associates, 239 : a total of 353 members.

A tremendous amount of pioneer work has had to be done to bring the Institute to its present condition of efficiency, and it is quite impossible adequately to recognise, within the space limits of one article, the great personal services rendered in this way. The late Mr. W. Beauchamp Platts, the first General Secretary, served the organisation with efficiency and enthusiasm for twelve years, until his death, when his place was taken by Mr. D. G. Johnston. The Honorary Secretaries of the Institute have been Messrs. Wm. Crichton, R. F. Bacon, Alfred Atkins, and the present Hon. Secretary is Mr. W. Gray Young. The successive Presidents have contributed their full quota to the work of organisation and development. Their names are as follows :—1905-6, Wm. C. Chatfield ; 1906-7, Wm. C. Chatfield ; 1907-8, F. W. Petre (deceased) ; 1908-9, Thomas Mahoney (deceased) ; 1908-10, C. J. Mountfort (deceased) ; 1910-11, C. J. Brodrick ; 1911-12, Alfred Atkins (deceased) ; 1912-13, P. Y. Wales ; 1913-14, P. Y. Wales ; 1914-15, Wm. C. Chatfield ; 1915-16, W. A. Cumming ; 1916-17, W. A. P. Clarkson (deceased) ; 1917-18, C. A. Lawrence ; 1918-19, J. Louis Salmond ; 1919-20, J. Louis Salmond ; 1920-21, C. Reginald Ford ; 1921-22, C. Reginald Ford ; 1922-23, Wm. Crichton ; 1923-24, W. M. Page.

The governing body of the Institute is a Council, to which delegates from each district are elected annually by postal vote of all members resident therein. The Council meets annually at each of the various centres in rotation. At these gatherings the Annual Meeting of the retiring Council is held on the first day, and on the succeeding days the Annual General Meeting of the members of the Institute and the First Meeting of the newly elected Council take place. The Council is called together in the interval at such times as occasion may warrant, but the executive functions are meanwhile exercised by an Executive Committee, composed of the Wellington members of the Council meeting in the capital.

The detail work of the Institute is carried out by numerous standing committees, established to deal with the following :—Architectural Education, Legislation, Finance, Practice and Discipline, Materials, and from time to time such Special Committees as are needful.

In order that close touch may be kept with individual members, seven District Branches are established with headquarters in the chief centres. Each of these branches has its own local organisation and can deal with matters affecting the purely local interests of its members, but is subordinate to the Council on matters of Dominion interest, to secure uniformity of policy.

The Institute is gradually developing its powers. Its Scale of Charges is fairly generally accepted. It is now very frequently consulted in connection with Architectural Competitions and has in many instances secured the acceptance of its Regulations for their proper conduct, and the non-recognition of these has often had dire results. The Code of Ethics under its regulations has assisted in establishing an improved tone in the general practice of the profession.

Housing and town planning have been prominent questions and the Institute took a leading part in a national conference called by the Government of New Zealand a few years ago to consider various aspects of town planning, with a view to legislation. A measure, which represented a fair compromise between conflicting interests without sacrificing too much in the way of ideals, was prepared and introduced into Parliament, but there have always been other questions more pressing for the politicians of the day, and, so far, town planning has not been the subject of a comprehensive measure, although a few useful provisions have been included in amendments of the Municipal Corporation Act. New Zealand, as a developing country, offers many examples of the necessities for long vision in town planning and city planning, and it already provides much evidence of the waste and inconvenience due to failure of former civic administrators to take thought of the future. Thus the field is wide open for the town planner, and the New Zealand Institute of Architects is not neglecting its obligations in this respect. Town planning organisations, some years ago, showed considerable vigour, but in the face of official indifference they have been discouraged out of existence, and the New Zealand Institute of Architects is one of the few bodies which have of recent years kept the subject prominently before the community. Further steps are now being taken in conjunction with the Civil Engineering and Surveying Professions to obtain better recognition of the needs in this direction.

The movement to improve the status and training of the student of architecture in New Zealand began in most centres and in the capital in 1909, when a Students' Association was formed, and competitions were held. Somewhat later, students were accepted for registration as students of the Institute. Some of them are now practising members of the Institute.

The passing of the N.Z. Institute of Architects' Act of 1913 involved, as previously indicated, the setting up of a qualifying examination for membership, and the first examination under the syllabus took place in 1918. The Examinations, however, did not come into general application immediately, as owing to the lack of facilities and loss of time and study through the war service of many students, it was deemed advisable to exempt some of the candidates for a certain period, a concession involving an amendment of the Act. The preliminary examination was not fully enforced until December 1921, as many students who had commenced professional studies had not, during their school period, passed the Matriculation examination, the qualification required in the way of general education. It was found that the original syllabus was insufficiently detailed, and hardly of an adequate standard, therefore an amended syllabus was submitted to the annual meeting of 1921. This was approved, subject to the incorporation of several suggestions made by Mr. W. H. Gummer, in a paper on Architectural Education. The syllabus was thus remodelled, and in lieu of the Intermediate and Final examinations there were substituted the First and Second professional and Final examinations, the three examinations permitting the student to make a better distribution of his efforts. More drawings and testimonies of studies were required. Since the introduction of the new syllabus, rapid progress has been made, the standard of work has much improved, and the educational value of the tests has been clearly demonstrated.

To provide greater facilities for these examinations, the work of the various Students' Associations was co-ordinated under the guidance of a sub-committee appointed by the Institute Committee of Architectural Education, one of the features being a system of competitions, synchronised throughout the various

centres. There are active Students' Associations in Auckland, Hawke's Bay, Wellington, Canterbury and Otago, and a great stimulus to the spread of architectural knowledge has been the result. Much, however, remains to be done to gain adequate facilities for complete and sound architectural training in New Zealand's many scattered centres.

The Institute now has under consideration the question of University Training, and a project is on foot to establish a Chair of Architecture at one of the Colleges of the N.Z. University, and to co-ordinate its examination system with that of the University.

The New Zealand architects and students have a fine record in connection with the European War. Reference to this subject at the Institute's annual meeting in 1917 showed that fifteen Fellows and fifty-seven Associates had volunteered for active service, representing twenty-two per cent. of all the membership, exclusive of many students, and that four had won military distinctions on active service. New Zealand's Roll of Honour of the Great War contains several names of Institute members.

Reviews

SHEFFIELD. *A Civic Survey, and Suggestions towards a Development Plan. Report by Patrick Abercrombie, in collaboration with R. H. Mattocks.* [*The University Press of Liverpool, Ltd. Hodder & Stoughton, Ltd., London.* 1924.]

THE DEESIDE REGIONAL PLANNING SCHEME. *By Patrick Abercrombie, Sydney Kelly and Theodore Fyfe.* [*The University Press of Liverpool, Ltd. Hodder & Stoughton, Ltd., London.* 1923.]

STRATFORD-UPON-AVON. *Report on Future Development. By Patrick Abercrombie and Lascelles Abercrombie.* [*The University Press of Liverpool, Ltd. Hodder & Stoughton, Ltd., London.* 1923.]

All Town Planners owe a debt of gratitude to Professor Patrick Abercrombie and his collaborators for the sterling work they have done in the preparation of regional reports. First we had that on Doncaster, which set up a standard difficult to improve on, and now we have to notice three more, each in its way no less informing, and invaluable to those on whom will devolve the duty of guiding the future destinies of these areas.

The three reports before us differ greatly in character, one dealing with a great manufacturing town, the next with nearly half a county, mainly agricultural in character, but with definite industrial possibilities, and the third with a small country town unique in its importance as a place of pilgrimage to all people of our race and language.

Needless to say, the approach in each case is on different lines, and herein lies the interest of being able to compare the three. Those on Sheffield and Deeside open with an historical outline, without which the key to much that follows would be lacking, but in the case of Stratford-on-Avon the past so dominates the present that no specific study on these lines is needed, and the main substance of the report is devoted to the preservation of the town as an illustration of how it can maintain its characteristic quality without proving to the disadvantage of its inhabitants, who have, after all, to carry on their work and gain a living not solely by supplying the wants of those who come to do homage to Shakespeare. The exposition of this view by Professor Abercrombie and his gifted brother steers a most judicious course between the extremes that might be credited to the archæologist and the rationalist, and reconciles most skilfully the valid claims of both. They deprecate any attempt at putting back the clock and reproducing seventeenth-century Stratford, while they are most insistent that nothing should be introduced that might conflict with the amenity and harmony that still, in the main, characterise the town and its surroundings. Every factor that may be employed in preserving these is carefully noted, and we have only been able to find one instance where it may be suggested that they might have carried their programme a little further. The present town lies within lines already defined of the river on the East, the canal on the North, and the railway on the West and South. Might it not be advantageous to form somewhere near these boundaries an encircling tree-planted promenade of modest dimensions so as to mark off future extensions, more particularly those of an industrial character, for which an appropriate location is suggested towards the north-west ?

We must, however, leave this pleasant book with its attractive illustrations and turn to that embodying the comprehensive studies of Sheffield, studies which have been carried further than any hitherto published in this form.

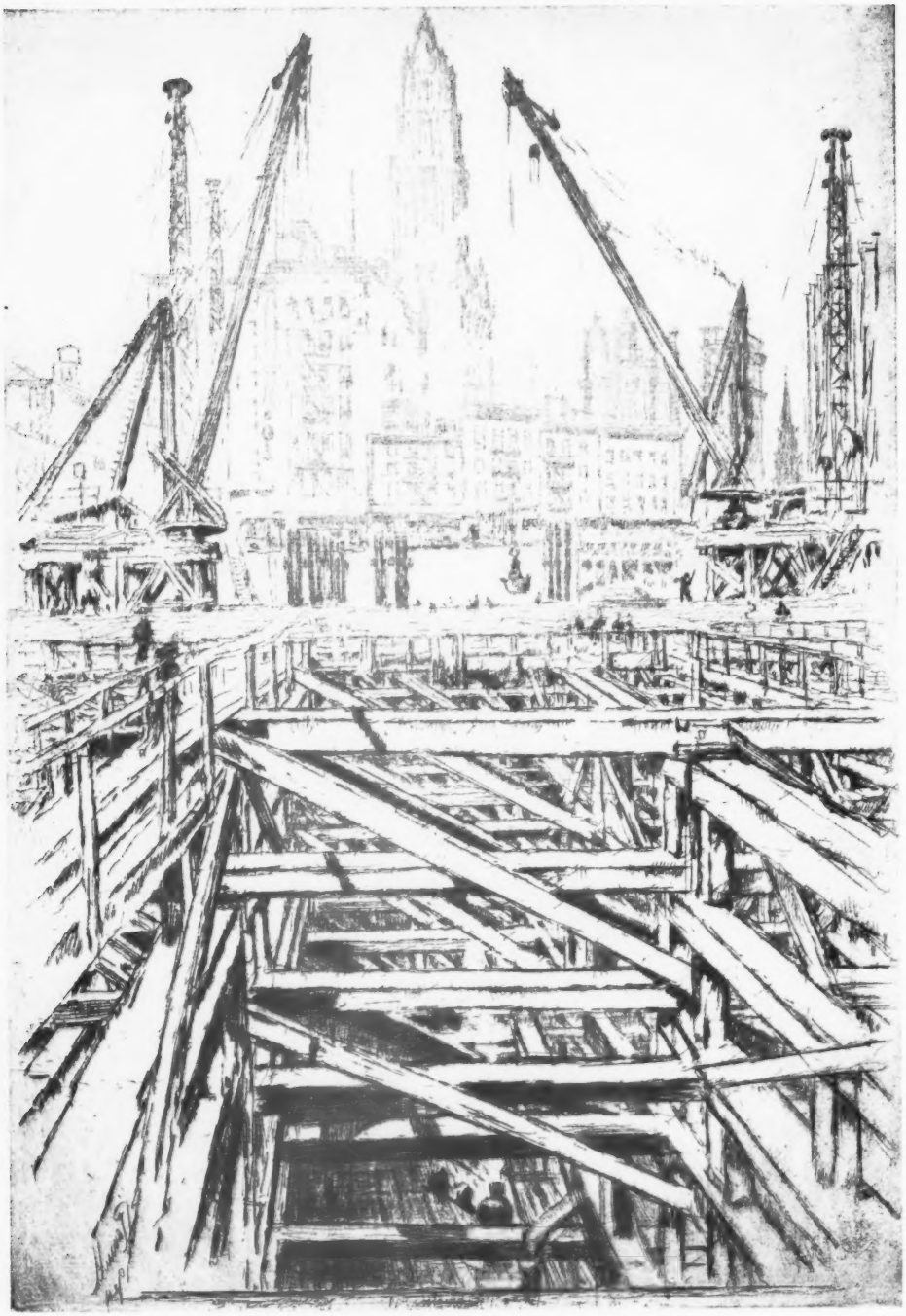
This report deals in Part I with the survey of existing conditions, and in Part II with the proposals for future developments. Beginning with topographical studies and following up these with the story of the city's establishment and growth as an industrial centre, the survey continues by examining in greater detail the reasons why it takes its present form.

The position of the industrial quarters, the lines of communication, density of population, housing conditions, health and open spaces come in turn under review. The statistical diagrams, maps and views are all remarkably good, though it was not practicable to include all that have been prepared ; and at the end the author urges that these studies should be carried still further, feeling, as most must feel who have been

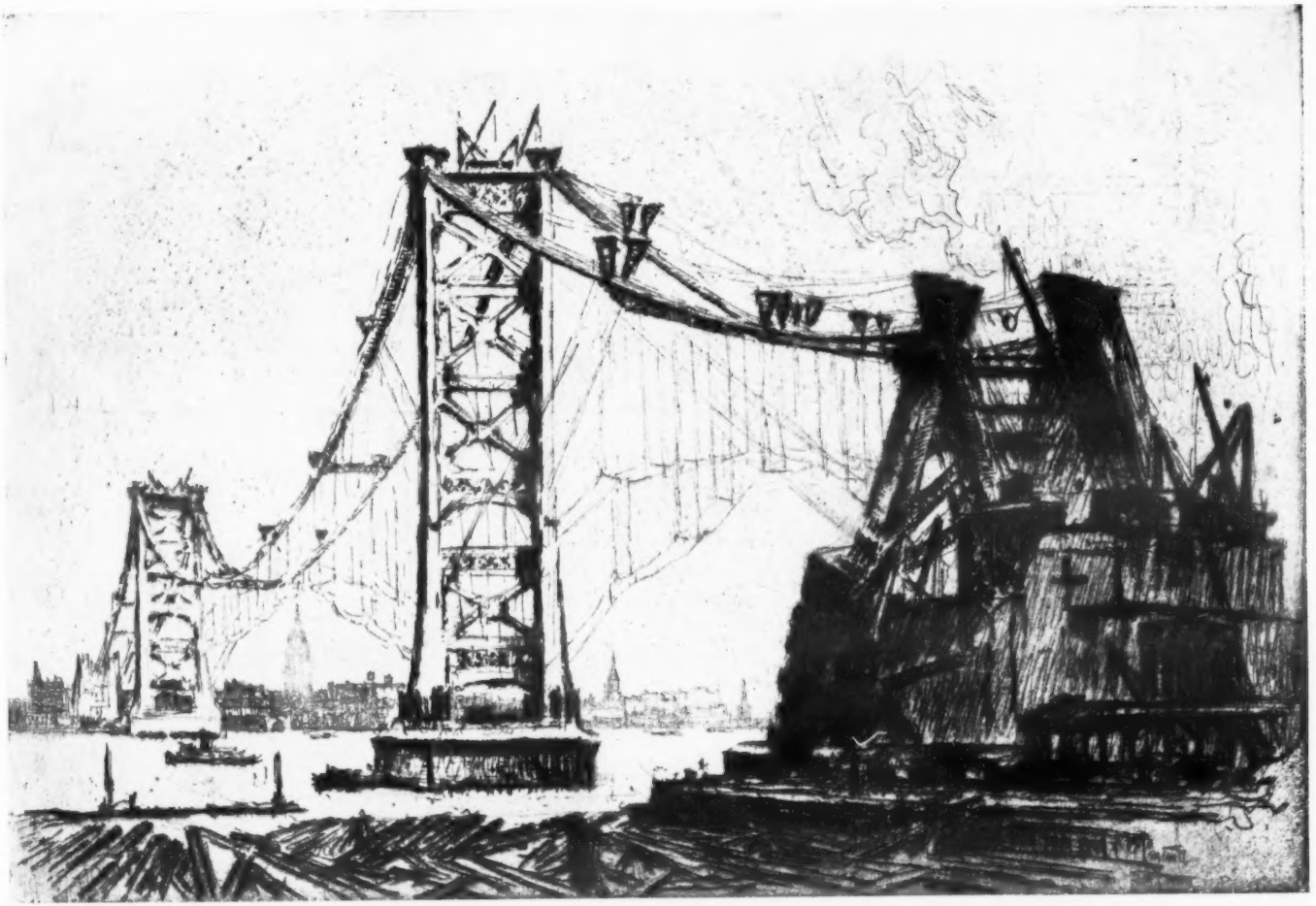
THREE ETCHINGS OF BUILDINGS IN NEW YORK

By JOSEPH PENNELL, Hon. Assoc. R.I.B.A.

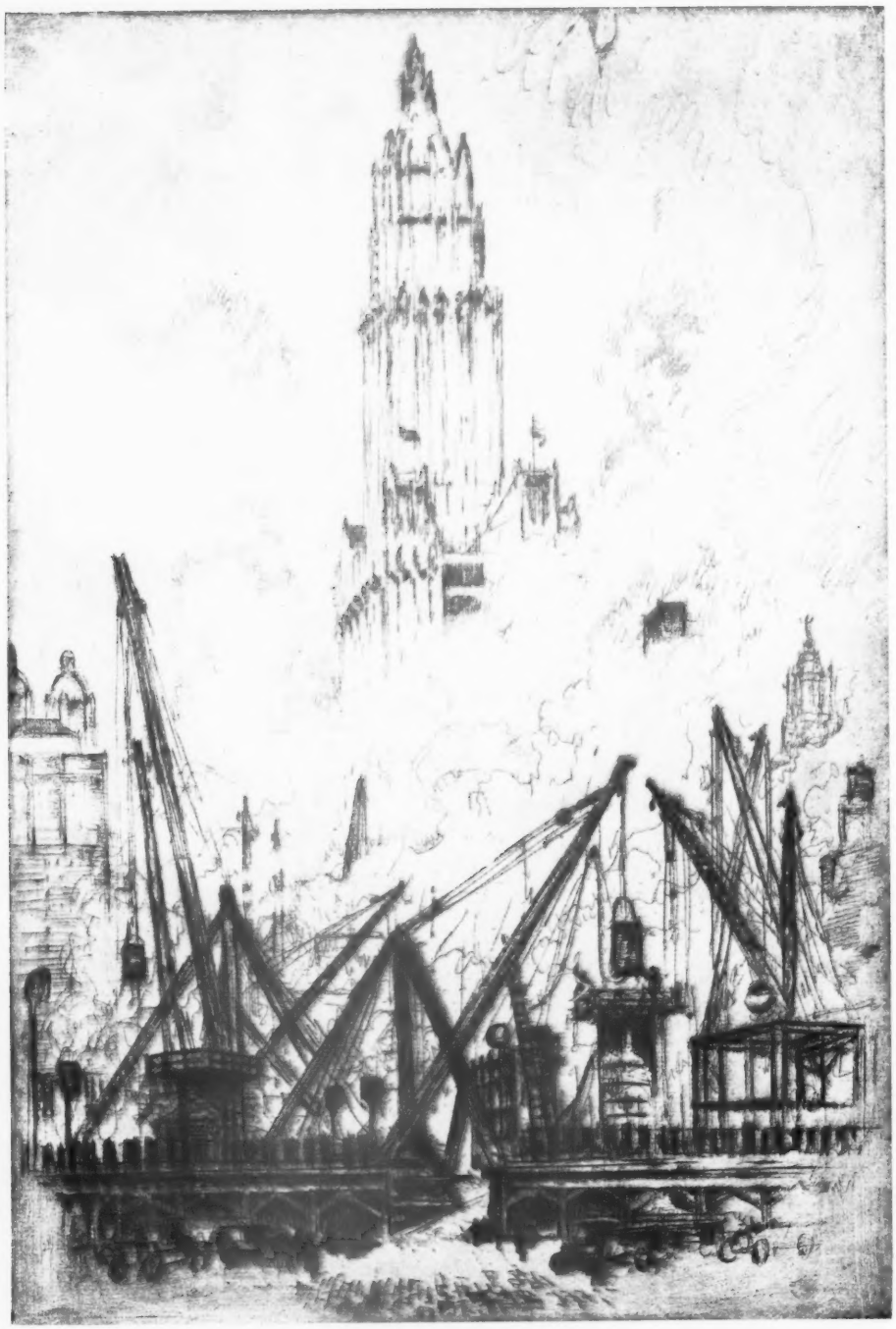
[THE ORIGINAL ETCHINGS WITH FOUR OTHERS HAVE RECENTLY BEEN PRESENTED TO THE R.I.B.A. BY THE ARTIST]



FOUNDATIONS OF THE TELEGRAPH AND TELEPHONE BUILDING, NEW YORK.
MC.KENZIE VOORHEIS & CO., ARCHITECTS.



The New Bridge over the Delaware River, Camden to Philadelphia. Paul Cret, Architect.



THE FOUNDATION OF THE TELEGRAPH AND TELEPHONE BUILDING, NEW YORK.
Sinking Caissons (Woolworth in distance).

so engaged, that the Civic Survey must be a continuous process, always finding new aspects for investigation and revising those already dealt with in order to keep them up to date.

Part II., giving the Development Plan, is even more illuminating as an exposition of methods and their graphic treatment. Opening with the zoning proposals, it devotes the succeeding chapters to Roads, Grouping of Population, Central Improvements and the Park System, following these with shorter chapters on Neighbourhood Centres and Satellite Suburbs, Suburban Growth, Intellectual and Artistic Centres, Water Transport, Railways and the Town Planning Schemes. This bare recital will indicate the wide extent of the ground covered, but not the logical and concise manner in which the conclusions arrived at are set forth.

The most cursory inspection of the report on Deeside must convince us that in few districts could there be a greater need for a Regional Planning Scheme. Industries and housing are both likely to expand their demands, while there are large agricultural interests to be studied also.

Here we have an area rich in coal and other minerals close to an estuary capable of being organised on an extensive scale, but neither of them exploited so far to a degree comparable with future possibilities. Docks, quays, road and rail are all inadequate ; it is therefore of the highest importance that these should be considered comprehensively, as otherwise haphazard developments would be inevitable.

The mineral resources being the key to the position, these naturally take first place in this investigation, but not without co-ordination between the economic demands and those of health, amenity and the historic character of the district, leading up to an outline of the proposals for zoning, Next we find the proposals for communications by road, rail and water, matters of especial importance in view of the undeveloped state of the area relatively to what may be anticipated. The road scheme looks admirable, but as regards the railways one gets the impression that the authors of the report might have done better to prepare a coherent scheme of their own rather than to have limited themselves to a review of the proposals already put forward, which seem to be in some degree alternative and competitive.

The development of the estuary itself is mainly a matter of reclamation and dock schemes. The general principles are indicated, but the details would obviously demand further data than could be obtained for a report of this tentative nature.

Finally, there are some brief but illuminating studies on Chester, Flint and the other towns included in the region, glancing back at the past, and also indicating their functional position in the programme sketched out. The whole, though necessarily an outline to be filled in as time and activities dictate, sets out most admirably the main factors which should guide development, and is of great interest as illustrating the desirability of preparing regional schemes.

H. V. LANCHESTER [*F.*].

EARLY ARCHITECTURE IN WESTERN ASIA.

An Historical Outline by Edward Bell, M.A., F.S.A. Bell & Sons.

The human-headed bulls from Sargon's palace at Khorsabad, the winged lions from Nimrud, and the wonderful slabs representing the royal lion hunt from Nineveh will always have an attraction for visitors to the British Museum. It is now many years since Layard's discoveries astonished the archæological world and Rawlinson deciphered the cuneiform inscriptions. But such examples belong to the beginnings of modern civilisation and are practically contemporary with the first Greek Olympiad. Sayce added much to our knowledge in his *Races of the Old Testament*, published in 1891. But recent excavations and investigation tell us more. The head of the Persian Gulf appears to have been inhabited by Sumerians, claimed to be a non-Semitic people from the region of the Caspian Sea, their chief town being Nippur, and they left their mark on all succeeding civilisations. There are examples of Sumerian sculpture that belong to the fourth millennium. Somewhere about this time a fusion is claimed to have taken place with the Semitic communities of Akkad in the north, and a Semitic dynasty supervened, connected with the legendary name of Sargon, about the year 2650 B.C. It was, however, of short duration, and the Sumerians regained their independence.

The name of Gudea here makes itself prominent. Sculptural representations of this ruler exist, together with much information as to his doings recorded upon clay cylinders. He built a temple, in which the lion and the bull are noticeable features. From Lagash, his capital, prosperity passed upon his death to the city of Ur, which ultimately surrendered to its western neighbours, the Elamites, and thenceforth the Sumerian sovereignty ceased to exist. The years were now uneventful until an invasion of Amorites from the desert established the kingdom of Babylon, which was to remain representative of the East until the conquest of Cyrus, which brings us into classic times.

It is now that the Hittites come upon the scene. They have been rendered familar by references in the Old Testament. Ezekiel tells us that the mother of Jerusalem was a Hittite. Canaan, too, begat Zidon and Heth (or the Hittites). They made a raid upon Babylon from their stronghold of Boghaz-Keui, south of the Black Sea, in the 18th century B.C., and

exercised an increasing dominance, not only in Babylonia, but throughout Asia Minor generally. The Assyrian king Tiglath Pileser stayed their power (c. 1110), and under further defeats by successive kings they disappear from history.

But it is evident that their civilisation affected architecture in no small degree. The remains at Boghaz-Keui, which include the palace of Hattusil II (c. 1270 B.C.), are of great interest. They built of stone in contrast to the mud brick of the Euphrates Valley. The familiar lion guards the portals, the remains of which clearly indicate the egg-shaped arch associated with Ctesiphon. It has been suggested that wooden columns formed part of the scheme, and an Assyrian record exists acknowledging the indebtedness of their builders to Hittite enterprise. The widely extended influence of this people appears in the sculptured slabs from Singerli, situated in the bend of coast between Antioch and Tarsus, attributed to the 15th century B.C. Here we have the same vivid treatment that is so attractive in the hunting scenes from Nineveh, while their expression rests rather upon the *naïveté* of their conception than upon a conventional decorative display. The faces are beardless, as in Sumerian sculpture. The figure of a warrior from the King's Gate at Boghaz-Keui is a striking example of this freedom of manner, and supports the author's suggestion that Greek sculpture was indebted to the expansion of civilisation through Asia Minor rather than to Minoan sources.

Ethnography is still a much debated science, language and types being so often at variance. The distinctions of dolichocephalic and brachycephalic, so much relied upon, are not universally accepted as conclusive evidence of race. More attention is being paid to facial formation, and it may well be that the Garden of Eden will again come into its own.

As matters stand at present, however, this book represents a most readable summary of events and their influence upon architectural development from the earliest times until the era of Persian supremacy.

C. J. Tait [*F.*].

THE LAW RELATING TO BUILDING AND BUILDING CONTRACTS. *By W. T. Creswell, of Grays Inn and South Eastern Circuit, Barrister-at-Law, Licentiate R.I.B.A., etc. London*, 1924. *Price* 7*s.* 6*d.* (*Sir Isaac Pitman & Sons.*)

Mr. Creswell is known as a writer on legal subjects, and to the architectural profession particularly, by his articles in *The Builder* on the subject of building contracts. A book amplifying these articles is sure of a welcome by architects, probably because in these post-war days matters of contract seem to touch the architectural profession more closely than they used to do.

The same may be said of statutes relating to building and also of the subject of arbitration, and it is significant that, though these matters are subjects in examination curricula, no great facilities are given in some of our schools for teaching them to the students.

In 1913 Master Ball, of the King's Bench Division, wrote a work on the Institute form of contract (published by *The Local Government Journal*) with suggested alterations and amendments to meet particular cases, which was well received both by architects and contractors, probably because it differentiated so well between the lump sum as distinct from the quantity form of contract and also gave a useful form of sub-contract.

The advent of the Ministry of Health forms of contract, though found extremely deficient in many cases, has had one great beneficial effect in making all interested parties realise that the Institute form, whatever its shortcomings may be, is to-day the most practical and simple form for everyday purposes.

The sphere of Mr. Creswell's book is a limited one and is directed to the assistance of those who do not profess to be lawyers; but it is so exhaustively indexed that its sphere may become wider than the author intends.

Master Ball, in his work, presumes a certain knowledge in his reader of the elements of a contract, and these may not be altogether simple. The work under review has the advantage that nothing is presumed and the reader is taken pleasantly through introductory definitions which give a solid foundation whereupon to build the more complicated structure, the turrets and finials, as it were, of fine points of law or procedure.

The position in contracts with corporations is fully dealt with and quotes the most recent decisions under the Public Health and Working Classes Acts.

Probably the most interesting chapter is No. 10, which deals with penalties and liquidated damages, differentiating between the two and illustrating the fine division line which has to be observed.

The book is one which will be well received by all interested in building matters, and is so simply written that students will find it a useful *vade mecum*.

W. E. Watson [*F.*].

ARCHITECTS' BENEVOLENT SOCIETY.

Scheme of Insurance.

In view of the interest shown by architects in the Scheme of Insurance, the Council of the Architects' Benevolent Society have recently secured the help of an advisory committee of insurance specialists.

The Architects' Benevolent Society is now in a position to answer enquiries on every class of insurance business, whether concerning existing or contemplated policies, and is ready to give considered advice on all such questions.

St. Paul's Cathedral

EXPERT COMMITTEE'S FINAL REPORT

THE Representative Committee for the Preservation of St. Paul's Cathedral met on the 16th February at St. Paul's and received the report of the expert advisers.

The Dean of St. Paul's presided. There were also present Canon Newbolt, Canon Alexander, Canon Simpson, the Archdeacon of London, the Bishop of London, the Lord Mayor, the expert advisers (except Sir Aston Webb, who was prevented by illness from attending), Sir Charles Morgan, representing the Institution of Civil Engineers, Sir Lewis Dibdin, representing the Ecclesiastical Commissioners, Mr. C. S. Peach, representing the Royal Institute of British Architects, and Mr. H. T. A. Dashwood, Chapter Clerk.

The Archbishop of Canterbury was unable to attend through illness.

It was proposed by the Dean, seconded by the Bishop of London, and agreed, that the terms of reference of the Committee should be :—

> To consider the question of the right course to follow in the works necessary for securing the stability of the Cathedral fabric, and to administer the funds which have been, or may be, collected for the purpose of those works.

Steps are being taken to complete the Committee by co-opting four men of public standing.

Mr. Dashwood was appointed secretary to the Committee.

TEXT OF THE REPORT.

19, Queen Anne's Gate, Westminster, London, S.W.
14 February 1925.

To the Very Reverend the Dean and Chapter of St. Paul's.

ST. PAUL'S CATHEDRAL.

Gentlemen,—Your Commission, in pursuance of the reference to them in October 1921, "to examine the building and to advise what methods should be adopted for its preservation," now submit their report giving the result of their investigations into the condition of the Cathedral, together with an account of the observations that have been made and reasons for the conclusions arrived at, and for the recommendations made.

Your Commission held its first meeting on 28 October, 1921, when it was unanimously agreed that the chair should be taken by Sir Aston Webb, K.C.V.O., P.R.A., F.R.I.B.A. About 50 meetings have been held, and individual members of the Commission have, in addition, paid many visits to the Cathedral to inspect work in progress or to render themselves familiar with particular aspects of the problem under review.

Your Commission's investigations up to the present have been mainly directed to the condition of the structure under and composing the great dome. The surveyor to the fabric, Mr. Mervyn Macartney, F.R.I.B.A., placed before the Commission, of which he is a member, all the available data in the shape of drawings and reports made in the past, which were carefully examined and perused. It then became clear to your Commission that there was an absence of precise data as to the condition of the dome structure, and also an absence of accurate levels and measurements from which it would have been possible to ascertain definitely what movements, if any, had been taking place in the structure. As a consequence, a great deal of the valuable investigations made by previous commissions could not be utilized fully owing to the lack of a reliable datum system for comparison.

One exception to this was the installation of plugs inserted, under advice given prior to 1914, at each side of cracks throughout the fabric of the Cathedral. These plugs were designed to carry micrometer gauges from which variations in the cracks in three dimensions could be ascertained. Observations with these gauges had been made and recorded between the years 1914 and 1920, though unfortunately not continuously.

At an early stage of your Commission's investigations it was apparent that there were visual signs of damage in the masonry of the dome supports, in the buttresses and elsewhere, and that settlements that had occurred during construction had been corrected by levelling up course of masonry. They, therefore ordered a thorough examination and survey of the dome structure to be made and recorded. This was done at the end of 1921 and during the first three months of 1922. The immediate conclusion arrived at from this examination was that settlements of a regular and irregular character had occurred in the past, mainly ascribable to compression of the ground, but there was a complete absence of evidence that any settlements in the foundations were taking place, or in fact had taken place during recent years. This conclusion is formulated in your Commission's first interim report of June 1, 1922.

Although no evidence of recent movement in the foundations existed, it was felt that, if settlement was not taking place, positive evidence to that effect was essential. With this object in view, and also to provide a reliable basis for comparative measurements of other movements in the Cathedral, your Commission directed that a system of reference points permanently embedded in the masonry of the Cathedral should be installed, whereby levels and measurements could be observed by means of precision instruments and recorded for future comparison. The installation of this system was effected during the latter half of 1922, and since then three complete series of observations and measurements have been made at approximately six months' intervals.

The investigations of your Commission may be divided broadly as follows : the integrity of the foundations ; the movements of the dome structure ; and the stresses in the masonry of the dome and its supports.

A portion of the preliminary examination ordered by your Commission was the taking of levels on various masonry courses at different heights in the Cathedral—namely, on the impost in the crypt, the plinth of the church floor, the plinth of the main cornice, the Attic cornice itself, the benches in the whispering gallery, and masonry beds in the stone gallery and the lantern. These

levels showed that there is a departure from the horizontal of these courses, intended to be built horizontally, which becomes progressively less from stage to stage until at the lantern it is negligible. Similar indications were found as the result of plumbing the dome structure from the top of the lantern.

The testimony of these observations, which in your Commission's judgment is important, is that the settlement took place during the progress of the construction, and was irregular, in consequence of the lack of uniformity in the subsoil both as regards its strata and its previous compression under old St. Paul's. This settlement produced a tilt of the structure towards the south-west, which became more pronounced as more and more weight was placed on the foundations. In addition to the evidence of the rectification of levels mentioned in the previous paragraph there is further evidence, such as the insertion of compensating courses, that the effect of this settlement was corrected at the completion of each important stage in the construction—such as the main cornice, the stone gallery, and the parapets adjoining the external drum. In short, the greater part of the tilting observable to-day occurred during construction and was rectified from stage to stage ; the true measure of the subsidence and tilting that has taken place since the completion of the building is the deviation of the base and axis of the lantern from the horizontal and the vertical respectively, and there is no such deviation.

For an accurate system of levelling it was necessary that a permanent bench mark or reference point away from and uninfluenced by possible movements of the ground near the Cathedral should be available, and by the courtesy of the Post Office authorities this bench mark has been established on a disused cast-iron shaft penetrating into the London clay near the General Post Office. About 150 gunmetal sockets, specially designed to take hardened steel plugs for supporting levelling staves, have been inserted in appropriate positions in the masonry of the Cathedral. By this means direct comparison is always possible between one series of levelling and another.

Throughout the series of careful observations taken during 1923 and 1924 no relative settlement between the piers and other portions of the Cathedral fabric have been observed. It can, therefore, be stated with confidence that no settlements of the foundations are taking place at the present time.

Your Commission recommend that this levelling and plumbing should be repeated, completely or partly as circumstances may direct, at suitable intervals of time, so that the inception of any general or relative settlement of the foundations may be detected as soon as possible. They are of opinion that an appropriate time for the next complete series would be in the early spring of this year. Your Commission further recommend that, as in the past, a very jealous eye should be kept on all building operations in the vicinity of the Cathedral, which might alter the condition of the subsoil, with disastrous results.

The observations of the micrometer gauges recorded between the years 1914 and 1920 on the cracks in the drums supporting the dome indicated that an annual opening and closing of the cracks with a seasonal sequence, as well as a slow but definite steady increase in the width of each crack, was taking place. The opening and closing would indicate respectively an annual contraction and expansion of the masonry of the drums due to temperature changes and the increase a slow and progressive horizontal increase in circumference of the whole dome structure.

Careful measurements of the diameters of the drums made in the spring of 1922 reveal a distortion of shape consistent with a gradual increase of circumference, and the shape of the structure at the whispering gallery level showed distinct deviations from a true circle, with definite bulges over the north, south, east, and west great arches. Part of this deviation may be due to the effects of settlement during construction, but most of it, especially the bulges over the arches, is due to the cumulative effect of temperature changes. The north and south diameter was 6¼ inches greater than that from the east-north-east to west-south-west, and it may be reasonably inferred from this and the general shape of the whispering gallery that the expansion between the north and south has been greater than that between east and west, the movement having been towards the south.

The levelling sockets, 24 in number, embedded in the masonry of the whispering gallery, also carry reference points, between which precision measurements of 12 diameters across the inner drum have been made by an Invar tape under constant tension. These measurements confirm the distortion of shape previously noticed ; these 12 diameters are prolonged at each end across the corridor surrounding the whispering gallery by measurements between reference plugs embedded in the masonry of the corridor.

The precision measurements reveal that there is a periodic alteration in the length of the drum diameters, and the evidence is that the main temperature change is an annual one, the structure tending to resume the same shape at the same time of the year. There is insufficient evidence as yet to ascribe a value to the cumulative effect or progressive increase. The dimensions of these movements are roughly as follows :—Alteration of diameter of whispering gallery, ·005 ft. (say 1-16th in.) at a maximum point ; alteration in the distance across the corridor between inner and outer drums, ·001 ft. (say 1-80th in.).

In connection with the scheme of measurements, clamps for securing plumb wires have been embedded in the masonry at the top of the cone, in the keystones of each of the four open great arches, and in the main cornice at the top of each pier. Observations with the precision plumb-bob suspended from these points have indicated the following movements :—The top of the cone moves backwards and forwards under temperature changes, the range of movement being about ·01 ft., or say ½ inch. The period seems to be an annual one. The keystones of the great arches move in sympathy with the alterations in diameter of the whispering gallery, but not to the same extent. The piers have a slight annual oscillation, but the movement is very small.

As a reference basis for the linear measurements and plumbing, gun-metal plugs have been embedded in the masonry of the bastions at church floor level, from which measurements are made by an Invar tape to the intersection of two lines engraved on the brass plate at the centre of the church floor.

The reference points for linear measurement and the plumb-wires have been co-ordinated with the centre of the church floor by observation with theodolites, by which means not only the amounts, but also the direction, of the differences found between series of observations can be ascertained and recorded.

To sum up the results of the observations just described, the weight of evidence points to a periodic alteration in the shape of the fabric, undoubtedly due to the effects of temperature changes, but it is difficult to form an accurate quantitative estimate of this alteration, as its magnitude is of the same order as that of the accuracy of the apparatus employed. The periodic alteration in shape due to temperature changes is a natural one, and any attempt to restrain it would either be abortive, or, if partially successful in any part, would be liable to bring dangerous stresses upon some other portion of the fabric. The case is quite different, however, as regards the cumulative effect or progressive increase ; evidence exists that such an increase is taking place, and steps should be taken to arrest it.

Your Commission, therefore, recommend that in order to eliminate or minimise any progressive increase, systems of metal hooping, one encircling the inner drum and another the peristyle or outer drum, at about the whispering gallery level should be provided.

Turning now to the weight of the dome structure as a whole, your Commission agree with and have adopted the calculations of Mr. J. D. Drower, F.S.I., made in January 1914, and August 1921. The total weight of the dome, its drum and peristyle, the buttresses surrounding it, the eight piers supporting it, and the eight great arches, together with those portions of the walls and vaults of the choir, nave, transepts, and aisles carried by the piers and bastions, may be summarised as follows :—

	Tons
(1) Total from top of cross to top of keys of great arches	23,098
From top of keys of great arches to top of plinth, 4 feet 2 inches above church floor level	28,116
(2) Total from top of cross to church floor plinth	51,214
From church floor plinth to underside of foundations	16,056
(3) Total weight upon earth ascribable to the weight of the dome and its supports ..	67,270

The portion of the dome structure above the attic cornice consists as to its lower part of two circular walls or drums resting on the piers and bastions and the arches between them. The inner wall is a truncated cone with a batter of 1 in 12, an internal diameter at the base of about 112 feet, and a total height of a little over 90 feet from the top of the main arches to the passage around the base of the dome. The top of this inner drum forms the support of the interior dome and the brick cone which carries the lantern and the outer dome. The outer drum is cylindrical, with an outside diameter of nearly 140 feet, a height of about 39 feet to the base of the peristyle columns, and an additional height to the top of the stone gallery parapet of about 54 feet. There is a distance of a little over 6 feet between the drums at the level of the tops of the main arches, and they are joined by 32 radial cross walls, which are continued outside the outer drum in the form of buttresses.

There is little doubt that the weight of the drum comprising the peristyle and that of the inner drum with its top burden act independently, as, owing to the cracks in the 32 radial walls between the two drums, there is practically no physical connection between them. The cracks in these radial walls appear to be due to cumulative temperature stresses rather than to unequal settlement, as there is no vertical displacement relatively in these walls at their base.

The shattered condition of the masonry of some of the 32 buttresses placed around the outer periphery of the peristyle has been noted in many previous reports on the safety of the Cathedral. These buttresses do not play an important part in transmitting weight to the bastions, nor, in your Commission's judgment, is it desirable that they should.

The combined load of the dome structure is carried by the piers and the bastions, but the independence of action above alluded to is responsible for a certain concentration of loading on the inner drum. The problem as to what is the distribution of weight between the piers and bastions is one which, in the judgment of your Commission, does not in the present condition of the structure admit of an accurate solution. The design is such that the greater part of the weight of the dome structure is carried by the piers.

Suggestions have been made from time to time that more weight should be spread over the large area of masonry composing the bastions. In the opinion of your Commission, this transference of weight would be undesirable. The Cathedral is partly founded upon ground consolidated by Old St. Paul's ; the amount and extent of this consolidation is a matter of conjecture. The evidence is that considerable settlement took place during construction, but that a state of equilibrium has now been reached. Any considerable change in the disposition of loading would undoubtedly upset the balance and be productive of further settlement.

With the exception of the radial walls between the inner and outer drums, which have already been mentioned, the masonry above the level of the keystones of the great arches appears to be in sound condition, and there is every reason to suppose that the " great chain " round the base of the cone is still efficiently fulfilling its task.

A careful examination was made of the masonry composing the great arches, and on the whole it is in good condition, such cracks and fissures as were apparent being recorded on drawings left in the custody of the Surveyor to the Fabric. For reasons that will be given immediately your Commission do not consider that these cracks jeopardise the integrity of the dome structure.

Reference has been made to the concentration of loading on the inner drum, but your Commission hold the view that natural internal arch action in the lower part of the inner drum below the great windows about 40 feet in depth has the effect of transmitting the weight borne by the piers directly to them without making great demands upon the ribs of the main arches themselves.

In the judgment of your Commission, the horizontal plane of loading, that is the ruling one, and therefore most

necessary to consider, is that passing through the springing of the main arches. Statements have been put forward that the stress on the most highly-loaded portion of this plane is about 50 tons to the square foot, but with these statements your Commission do not in any way agree, as such a condition of loading must assume that the whole of the weight of the inner dome structure, amounting to about 14,000 tons, is completely carried on the front ribs of the main arches and transmitted solely by those ribs to a very small area at the inner ends of the tops of the piers.

The assumption in the preceding paragraph makes no allowance for the arching effect previously mentioned, nor for any part of the weight of the inner structure of the dome reaching behind the front ribs of the main arches and being transmitted to the bastions. An estimate of the distribution of the weight can only be a matter of opinion and judgment, but it is not over-stating the case to say that the stress intensity of 50 tons per square foot alluded to above is reduced to one-half this amount, or less, if due allowance be made for the increased area of the pier at the ruling plane which would be brought into action in consequence of the above considerations.

It is to be noted that sample 8 inch cubes of Portland stone from the Cathedral, tested at the National Physical Laboratory, did not crack until subjected to a load of 400 tons per square foot, and crushed under loads of from 430 to 490 tons per square foot.

A careful examination was made of the condition of the masonry composing the eight main piers supporting the drums and dome. These piers consist of an outer skin of Portland stone ashlar set in lime mortar. The ashlar is worked in conformity with the architectural features of these piers, but the breadth on the bed varies considerably. The interior of the piers is uncoursed rubble masonry of many kinds of stone bedded in the same kind of mortar. This mortar, which for its effective setting requires to be exposed to the atmosphere, has not properly consolidated in the interior, owing doubtless to the fact that, the piers being of considerable thickness, the atmosphere has been excluded from the interior by the hardening of the mortar in the joints of the ashlar casing.

The ashlar masonry is worked so as to show close joints on the face, which in many instances has resulted in the spalling or flaking of the edge of the stone, owing to a concentration of pressure at these places. At the level of the church floor plinth the load of 51,214 tons has been estimated by Mr. Drower to be carried as to 37,984 tons by the eight piers, and as to 13,230 tons by the four bastions. On this assumption the loading of piers at this plane is about 15 tons to a square foot averaged over their area.

In the crypt the load on each pier is greater, but the area of the piers is also greater, and the incidence of the load more favourable. It is probable, therefore, that the maximum intensity of stress at this portion of the structure does not reach so high a figure as at the church floor plinth. Under the footings the load on the earth has been calculated by Mr. Drower to be just over five tons per square foot under the piers.

The main question during these necessary investigations, to which your Commission has given much anxious consideration, after ascertaining the actual facts as existing at present, is the stability of the eight piers carrying the dome, and how far their structure, as previously described, is, or could be made, capable of resisting the pressure to which they are subjected.

Schemes for entirely rebuilding the piers have had most careful consideration, but to replace the existing piers with others, without taking down the dome, would entail transferring the load on to temporary supports. This operation, in the opinion of your Commission, would be attended by the very gravest risk, and they have arrived at the definite conclusion that any attempt to rebuild the piers would inevitably affect the foundations, at present stable, and the results would be disastrous.

The fact that no movement has been observed in recent years in the foundations led your Commission to make a large number of experiments with various forms of grouting with a view to ascertaining whether the piers could be satisfactorily consolidated by this method, which is on somewhat similar lines to that recommended by Sir Francis Fox some years ago. Beginning in the crypt, a number of bore-holes were drilled through the pier. From these bore-holes cores were removed which gave clear information as to the material of which the piers were built and the extent of any cavities which exist.

This investigation showed that the construction of the piers in the crypt was, on the whole, satisfactory. After thorough washing out, these bore-holes were grouted by the cementation process, using very dilute grout. A subsequent investigation of the interior of the piers showed that the grouting had successfully filled the small cavities existing. It was, however, found that some of the face stones had been embedded in plaster of Paris, and the washing out under pressure had, unfortunately, had a very deleterious effect on this plaster. Similar experiments were carried out in one of the piers above the church floor. Here, also, many face stones are bedded in plaster of Paris, and it was therefore decided that the grouting must be carried out with richer grout. A number of holes were drilled from each side of the pier to within a short distance of the opposite side. These bore-holes were bored in a systematic manner, beginning at the bottom and about 3 feet to 4 feet apart vertically. These holes were grouted at various pressures up to 50 lb. per square inch, grouting being continued until no further grout could be injected. The grout often appeared from holes at a higher level than that at which the injection was taking place. A subsequent opening out of parts of the face work showed that this grouting method had also been successful in filling the cavities and binding together the internal aggregate. This is the method which your Commission recommend should be carried out throughout the piers, with the addition that suitable reinforcing bars should be introduced into the bore-holes before grouting is complete. After this has been done any shattered or defective face stones can be removed without danger and replaced by stones of suitable depth.

The possible effect of vibration has been investigated by the National Physical Laboratory and subsequently confirmed by Mr. Mallock, and the conclusion arrived at is that no deleterious effect is taking place from this cause. Your Commission's recommendations may therefore be summarised as follows :—

(1) To consolidate the piers by grouting through bore-

holes on similar lines to the method adopted on the North-east transept pier already referred to, by strengthening the pier temporarily with steel and timber casing during the process, and by reinforcing the piers with metal rods embedded in the bore-holes, to be followed by replacement of any defective ashlar.

(2) To encircle the drums of the dome with metal hooping to check any possible cumulative increase in circumference of this fabric.

(3) To repeat at, say, six-monthly intervals the series of levelling observations and also the plumbing and other measurements described in the report and for which special instruments have been provided.

(4) To guard against danger accruing from building operations in the immediate vicinity and below the level of the foundations of the Cathedral.

Your Commission are of opinion that, if the work advised by them is carried out, the piers will be brought into a condition at least as good as at their original construction. They do not believe that a complete reconstruction of the piers and their foundations is advisable or necessary, and they wish definitely to disassociate themselves from any proposals of this nature.

We are, gentlemen, yours faithfully,

ASTON WEBB.
BASIL MOTT.
E. C. TRENCH.
G. W. HUMPHREYS.
MERVYN E. MACARTNEY.

Mr. William Dunn having found it necessary to resign his appointment as the representative of the Royal Institute of British Architects on the Committee now being formed by the Dean and Chapter of St. Paul's in connection with the administration of the funds recently subscribed by the public for the preservation of the Cathedral, Captain C. Stanley Peach, F.R.I.B.A., has been appointed in his place.

ST. PAUL'S CATHEDRAL PRESERVATION FUND.

Since the publication of the President's letter in the JOURNAL of 24 January (see p. 123) pointing out that as the profits from the sale of *The Sir Christopher Wren Memorial Volume : 1723–1923* are to be devoted to the St. Paul's Preservation Fund, the sum of £37 16s. has been handed to the fund, and the names of the individual subscribers have been acknowledged in *The Times* for £2 2s. each. The names of the subscribers will also be published in the R.I.B.A. JOURNAL.

The price of the volume is £5 5s., and orders, enclosing remittance, should be sent to the Librarian, R.I.B.A., 9 Conduit Street, London, W.

LOAN LIBRARY CATALOGUE.

A new catalogue, brought up to date, of the Loan Library has recently been compiled, and can be now obtained on application at the R.I.B.A., price 1s. 6d., postage 3d. extra.

British School at Rome

RETIREMENT OF THE DIRECTOR AND ASSISTANT DIRECTOR, THOMAS ASHBY, D.LITT., F.S.A.

By the retirement of Dr. Thomas Ashby this summer from the British School at Rome after some nineteen years as its distinguished director a gap will be left which will not easily be filled.

Dr. Ashby's unrivalled knowledge of Roman archæology and topography has with unvarying generosity always been at the disposal of all who have sought his help. Nothing is too much trouble—from looking up a train to taking one round the Palatine or supplying some recondite piece of information—if Dr. Ashby can thereby be of any use to the serious student.

Architects, especially when they visit Rome, will miss his kindness. For more than most archæologists Dr. Ashby understands the close bond that exists between archæology and architecture. Too often there is a failure to realise this connection, which results on the one hand in the treatment of archæology as the study of isolated remains of the past and on the other in the production of so-called "restorations" which are without any solid basis of fact.

Dr. Ashby has taught us to see the uselessness of such work. While giving every encouragement and assistance to any attempt at a reconstruction seriously based on existing evidence, he unhesitatingly lays his finger on inaccuracies and uses all the resources of his knowledge of the past to help us to make a restoration as far as possible a true picture of the site or building restored. The limitations imposed by historical fact are a salutary discipline for the imagination of the architect, and some study of history is, of course, essential as a background to any real understanding of the buildings of the past.

The British School at Rome has been singularly fortunate in having in Dr. Ashby a director who has made it his aim to stimulate artistic as well as archæological interest. In this respect students of the School in Rome have enjoyed advantages not to be found elsewhere. To watch over the work of students of five faculties—archæology, architecture, sculpture, painting and engraving—must always be a task requiring exceptional powers. To have established the value of archæological and historical scholarship in the minds of artists who often regard themselves as completely emancipated from the shackles of tradition is an achievement to which all must pay tribute.

Not only students and members of the Institute, but many other artists who have worked in Rome, have received from Dr. Ashby help and advice for which they will always be grateful.

The Royal Institute of British Architects did themselves the honour a short time ago of electing Dr. Ashby to be an Hon. Associate—a recognition not only of his eminence as an archæologist, but of his unfailing interest in the Institute and our profession, which must long have been appreciated by many of our members.

While we console ourselves by the thought that Dr. Ashby will in all probability be more within reach of those who desire to profit by his assistance, we shall all wish to record the debt which students of architecture (and especially myself) and architects owe to Dr. Ashby for the generous help he has afforded us as Director of the British School at Rome.

H. CHALTON BRADSHAW [*A.*]
Rome Scholar in Architecture 1913.

BRITISH SCHOOL AT ROME—contd.

MRS. ARTHUR STRONG, LL.D., D.LITT., F.S.A.

It is with the utmost regret that those who know Mrs. Arthur Strong will hear of her impending retirement from the British School at Rome, where she has acted as Assistant Director since 1907.

It was on my arrival in Rome, in January 1914, as the first of the Rome scholars in Sculpture, that I met Mrs. Strong for the first time, and the impressions I then gained of her charm and personality recur now most vividly to my mind. I remember the many interesting visits with Mrs. Strong, either to the Forum Romanum and the Palatine or to the Museo delle Terme to admire that wonderful marble throne of Venus—the Ludovisi Throne discovered in 1887—and talk about its Boston counterpart which is said to have turned up in the hands of a Roman dealer many years later. There was at the time a great deal of controversy about its authenticity. It was during these visits, and also during her lectures at the British School, that I learned something of her enthusiasm for research and her sensitive and imaginative appreciation of sculpture.

Mrs. Strong's activities and writings are well known; her life-work has been devoted almost entirely to the critical study of sculpture, and I should like, as a sculptor, to express my appreciation of her views. To me her great achievement is her book on Roman sculpture, published in 1907—now out of print. She deals with this vast subject, from the time of Augustus to Constantine, in an enthusiastic and convincing manner, which gave me a very different outlook on a most controversial subject. Mrs. Strong has said that the prejudice against Roman art as inferior still lives, and I must confess that in common with many students of my time my knowledge of the productions of that period was not only a little vague but almost contemptuous; we regarded them as merely colourless imitations of Greek work made by Roman craftsmen for the Roman market. In many instances this was undoubtedly the case, but after reading Mrs. Strong's very definite views on the subject one is compelled to admit that Roman art had developed primarily from the primitive Latin and Etruscan elements, and, although influenced very largely by the Greek, it formed a vital and original national art. "This Etruscan element is very necessary to grasp, because, though eclipsed by the Greek long before the Augustan period, it yet never entirely died out. It had really coalesced with native tendencies and was thus among the agencies which helped to create a Roman Imperial style out of imported Greek art."

The outbreak of war put a stop to my own studies in Rome, and since then it is only on the rare occasions when Mrs. Strong has been in London that I have had the pleasure of meeting her. I know how wide are her interests in sculpture, ranging from Greek and Roman, the Italian Renaissance, Bernini and Rodin, to the youngest school of all, the students at Rome; and I should like to hear some day her considered opinion on our own British sculpture which is now developing and changing so rapidly.

Her words, uttered now nearly twenty years ago, are prophetic in their application to the trend of present-day sculpture. "Modern portraiture has suffered from doctrines of illusionism and impressionism pushed beyond the limits of reasonableness, but the feeling for mass—the re-assertion of the material apparent in the works of certain great modern sculptors . . . induces the hope that the art of sculpture may recapture the most precious of its characteristics without passing again through the ordeal of a 'Dark Age.' In the light of science and with knowledge as a guide, art may learn to hold its intermediate conquests while making deliberate return to principles and doctrines which lie at the very root of sculpturesque expression."

GILBERT LEDWARD,
Rome Scholar in Sculpture, 1913.

WATERLOO BRIDGE.

On Thursday, 19 February, a Conference took place at the Royal Institute of British Architects which was attended by representatives of the R.I.B.A., the Town Planning Institute, the London Society, the Society for the Protection of Ancient Buildings, and the Architecture Club. Mr. Arthur Keen, Hon. Secretary R.I.B.A., presided.

The report of the Special Bridges Committee of the London County Council was discussed, and the following resolution was passed unanimously:—

> "This Conference is not satisfied that Waterloo Bridge is worn out and should be destroyed. It, therefore, recommends that the question should be referred to an independent expert Committee to determine (after hearing evidence and taking such advice as they may require) whether the Bridge can be underpinned and made strong enough for modern traffic for many years to come. In the event of such independent expert Committee reporting that underpinning is practicable, this Conference is of opinion that the underpinning should be proceeded with and provision for the increasing cross-river traffic made elsewhere, as would have been done if the sinking of one of the piers of Waterloo Bridge had not occurred."

It was decided to request the London County Council to receive a deputation from the bodies named above at their meeting on Tuesday, 24 February.

MR. RONALD P. JONES [*F.*].

A prospective addition to the architect members of the London County Council is Mr. Ronald P. Jones [*F.*], who has been selected the Progressive candidate for South-West Bethnal Green in succession to the late Mr. Stewart Headlam. The two other architect members are Mr. Andrew T. Taylor, who has long retired from practice, and Major Harry Barnes (Vice-President, R.I.B.A.), who is an Alderman, L.C.C. Mr. Jones has for twenty years been actively engaged in social work in Bethnal Green; in 1914 he designed, built and presented for all time "Mansford House," Birchington, as a seaside holiday and convalescent home for Bethnal Green people. A graduate of Oxford, Mr. Jones received his architectural training at Liverpool University; he was for a time assistant lecturer on architecture at King's College, and is a member of the Art Workers' Guild, the Society of Hellenic Studies, etc. Mr. Jones has frequently contributed to the R.I.B.A. JOURNAL. The Election will take place on 5 March.

The Prizes Conference

REFERENCE TO THE PRIZES COMMITTEE FROM THE CONFERENCE.

" To consider and report to the Prizes Conference on Wednesday, 19 November, upon the co-ordination of the Prizes of the British School at Rome, the Royal Institute of British Architects and the Society of Architects with special reference to the following points :—

[1] The establishment of some scheme of progression from the smaller to the larger Prizes.

[2] The question of setting a minimum standard of education to be required of candidates for admission to the competitions. The Conference is of the view that this is a better basis than an arrangement of maximum age limits.

[3] Methods of setting subjects and awarding Prizes.

[4] Overlapping of Prizes.

[5] Excessive number of Prizes.

REPORT.

The Committee appointed by the Conference on Prizes have carefully considered the reference to them from the Conference on the co-ordination of Prizes and the establishment of some scheme of progression from the smaller to the larger Prizes.

The Committee realise that the Prizes given within and by the schools do not come within the scope of this reference, and they have accordingly only dealt directly with the open Prizes given by—

The Faculty of Architecture of the British School at Rome,

The Royal Institute of British Architects,

The Society of Architects.

The Committee contained representatives of each of these bodies, and the suggestions embodied in this report were agreed to unanimously as a basis upon which some such scheme as the Conference desires could be brought into being without unduly disturbing the existing arrangements.

At present there is no doubt that there are many anomalies such as the age limit for the Rome Scholarship in Architecture [the most important students' Prize] which is fixed at 27, while the limit for the Soane Medallion is fixed at 30. In some Prizes a declaration is demanded that the work submitted is the student's own ; in others no such declaration is required. The work attached to some is out of all proportion to that attached to others of equal value. The values also have not in all cases been raised to meet the needs of post-war expenses. That most of these anomalies can be swept away by co-operation between the bodies concerned the Committee have little doubt.

The Committee recommend that the Prizes undermentioned be roughly divided into two groups :—

1. Students' Prizes.
2. Post-graduate Prizes and Bursaries.

STUDENTS' PRIZES.

As regards the Students' Prizes, it appears to the Committee that as the Rome Scholarship is unanimously admitted to be the senior Prize offered to the student in Design, the first step in co-ordination is to locate the other Design Prizes as far as possible in that portion of a student's career during which he may be expected to be working up for the Rome Scholarship, and that the same system of setting subjects and making awards should be adopted for these as for the Rome Scholarship.

The Prizes which appear to come under this category are :—

1. The Tite Prize.
2. The Soane Medallion.
   The Victory Scholarship.
3. The Rome Scholarship in Architecture.
   The R.I.B.A. [Henry Jarvis] Studentship. (See diagram on p. 267).

The second step is to co-ordinate the age limits or other qualifications, and in this connection the Committee would like to see the age limit in the case of the Rome Scholarship [the regulations of which are outside the control of the R.I.B.A.] raised to 30, and in the case of the other Prizes removed altogether and minimum standards of education substituted, i.e., the Final Examination of the R.I.B.A. or its equivalent, or a certificate from a responsible architect to the effect that the candidate is up to the required standard, for the Soane Medallion and the Victory Scholarship ; and the Intermediate Examination or its equivalent, or a certificate from a responsible architect, to the effect that the candidate is up to the required standard, for the Tite Prize, which is a Prize offered for the study of a particular phase of architectural design.

For all these Prizes a declaration identical with that in force for the Rome Scholarship should be insisted upon, i.e., that the work is the student's own.

The work for these Prizes should be done at a time of the year least calculated to interfere with school work. The exact period should be settled in consultation with the schools.

It will be observed that if these main considerations are approved, these Prizes will be brought into direct relationship with the career of a student in the schools without in any way preventing non-school students from competing.

In order to ensure further co-ordination and progression from one to the other, the following detailed proposals are offered by the Committee for consideration :—

Co-ordination.

The conditions for the Rome Scholarship in Architecture should be followed for the other prizes generally, and the Soane Medallion, Victory Scholarship and Tite Prize should be judged by juries composed of :—

Two members of the Board of Architectural Education [not teachers].

Two teachers [who may or may not be members of the Board].

One member of the Council R.I.B.A. [not a member of the Board].

The R.I.B.A. " critic " [non-voting member].

" *Loges.*"

The Committee recommend that for the above competitions " loges " be arranged in London and in the provinces [where necessary] under approved authorities.

The Tite Prize.

The Committee recommend that the competition be open to candidates who have passed the R.I.B.A. Intermediate or equivalent Examination [i.e., candidates in their fourth year of study], or who produce certificates from responsible architects to the effect that they are up to the required standard. The Prize to be of £50 and awarded annually instead of £100 every other year as at present.

The Committee recommend that there be a Preliminary Competition and a Final Competition.

That the Preliminary Competition shall consist of a 12 hours' sketch design done " en loge."

That the Final Competition shall consist of a 12 hours' sketch design done " en loge," candidates to be allowed a further period in which to finish their drawings.

The Committee recommend that the Jury for the Tite Prize be empowered to choose from the competitors, students whose designs are sufficiently meritorious for the purpose of exempting them from some or all of the Testimonies of Study for the Final Examination.

The Soane Medallion and the Victory Scholarship [in alternate years].

The Committee recommend that the competition be open to candidates who have passed the R.I.B.A. Final or equivalent Examination or who produce certificates from responsible Architects to the effect that they are up to the required standard.

It will be most desirable to raise the Victory Scholarship to the same value as the Soane if possible, so that these Prizes may be identical, i.e., £150 annually.

The following will be admitted direct to the *Final Stage* of the competition for the *Soane Medallion* and the *Victory Scholarship* :—

[*a*] The winner of the Tite Prize.

[*b*] The winner of the Royal Academy Silver Medal.

[*c*] The winner of the Alexander Thompson Travelling Studentship [Glasgow].

[*d*] The winner of the Rowand Anderson Travelling Studentship [Incorporation of Architects in Scotland].

[*e*] The two candidates with the highest marks in Design in the two previous R.I.B.A. Final Examinations.

[*f*] One student nominated by each School of Architecture recognised for exemption from the R.I.B.A. Final Examination.

The Committee recommend that there be a Preliminary Competition and a Final Competition. That the Preliminary Competition shall consist of a 12 hours' sketch design done " en loge."

That the Final Competition shall consist of a 12 hours' sketch design done " en loge," the candidates being allowed a further period in which to finish their drawings.

The Committee recommend that the Jury for the Soane Medallion and the Victory Scholarship be empowered to choose from the competitors for those Prizes students whose designs are sufficiently meritorious for the purpose of exempting them from some or all of the Testimonies of Study for the Final Examination.

The Rome Scholarship in Architecture and the R.I.B.A. [Henry Jarvis] Studentship.

It is recommended that the winners of the *Soane Medallion* and the *Victory Scholarship* should be admitted direct on one occasion to the *Final Stage* of the Rome Scholarship competition within, say, 2 years of passing through either of these Prizes. Students recommended by the Principal from schools with a five years' course should be exempted from submitting portfolios before taking the preliminary stage.

SKETCHING AND MEASURED DRAWINGS PRIZES.

[*No maximum age limit or minimum standard of education is laid down for these Prizes*].

†1. £50.* *R.I.B.A. Measured Drawings Prize :* [Awarded in alternate years.]—[To be remodelled on the lines of the Pugin and raised to the same value, but without the Mediæval limitation, in order to encourage measured work throughout a student's career.]

†2. £75.* *Pugin Studentship :* [Awarded in alternate years.]—Sketches and measured drawings of Mediæval work only.

POST-GRADUATE PRIZES.

The Committee recommend that the following should be regarded as post-graduate Prizes and that none should be eligible to compete for them until they have passed the R.I.B.A. Final or equivalent Examination standard or have produced certificates from responsible Architects to the effect that they are up to the required standard and reached the age of 23, and that the further modification suggested in brackets in each case should be made if possible.

1. £130. *The Godwin Bursary :* [Awarded in alternate years.]—For practising architects for special study. [Should be increased in value owing to the increased cost of post-war travel.]

2. £250. *Alfred Bossom Travelling Studentship :*—First competition about to be held.

3. £100. *Owen Jones Studentship :*—[Candidates to be required to submit drawings showing their acquaintance with colour decoration, followed by a competition for approved candidates for an architectural design in colour.]

4. £50. *R.I.B.A. Essay Prize.*

5. £50. *Grissell Gold Medal :*—Construction as at present.

6. £50. *Henry Saxon Snell Prize :* [Awarded every third year.]—Study of hospital plans as at present.

7. £50. *Arthur Cates Prize.*—There has been no competition for 10 years. [This prize might be amalgamated with the Godwin Bursary or used for a Town Planning Prize.]

MAURICE E. WEBB,

Chairman, Prizes Conference Committee.

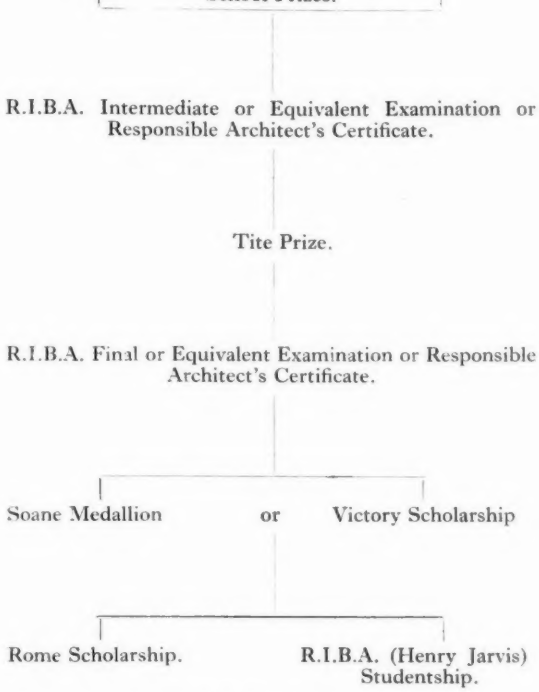
* It is intended that the work for these Prizes should be done as at present during the students' career and submitted at a time when he is ready for travel.

† N.B.—1 and 2 would then between them provide a Prize for measured drawing each year.

PRIZES CONFERENCE—contd.

DIAGRAM OF THE PROPOSALS CONTAINED IN THE COMMITTEE'S REPORT.

To illustrate the ladder of the Prizes for Design.



Obituary

R. B. MOFFAT [*Licentiate*].

Mr. Moffat, who died on 19 January, was articled to Messrs. Cancellor and Hill, at Winchester, and subsequently worked in the firm of Messrs. Parker and Unwin, first at Buxton, and subsequently at Baldock and Letchworth, where he helped in the development of the garden city. Latterly he was in practice for himself at Biggleswade, Bedfordshire. During the early part of the war he carried on the practice of Mr. A. R. Bowles, at Folkestone. Later he served in the R.N.A.S. in the meteorological department and was entrusted with special investigation work. On returning to practice he was engaged upon a housing scheme at Folkestone.

J. W. DENNISON [*F.*].

The death of Mr. John William Dennison, of Eastbourne, removes the oldest member on the rolls of the Royal Institute of British Architects. Mr. Dennison was elected an Associate over 60 years ago and was promoted to the Fellowship 53 years ago. He retired from practice in 1899.

Allied Societies

SOUTH WALES INSTITUTE OF ARCHITECTS.

"THE ARCHITECTURE WE DESERVE."

BY HALSEY RICARDO [*F.*]

(Précis of a lecture delivered at Cardiff on 5 February 1925.)

The lecturer, in the course of an historical review of the European Architecture of the past, pointed out that it was only on occasions of emotional stress, that it really represented the impulse of the nation as a whole. Except at such periods a nation was content to accept such structures as the ruling classes and the "intelligentsia" of the time provided, chiefly for their own personal needs. He showed that the elements of design had passed from the authority of the guilds to the direction by individual artists—that new materials and new methods were demanded: that the gradual invasion of scientific machinery tended to place craftsmanship on a different footing. The constructional force of the present day had two sides to it—the one concerned with the care, socially, of the whole population; the other with the physics and appearance of the buildings raised. For the satisfaction of our national conscience, we are determined that no one shall go unlettered, unhelped, uncomforted, so far as our schools, hospitals and churches can minister to the helpless. Our universities, public libraries, schools, museums and picture galleries, are available to all who desire to enjoy their benefits; and, in the days to come, our successors will point to the buildings we have raised to satisfy these needs as the outstanding triumphs of our age. In this twentieth century, architects have to take advantage of an age that is scientific and mechanical and that the best we can hope for, in the near future, is not now to return to "human" ways of building, but to the recognition of stark science, with the knowledge and availabilities that science provides for us. The scheme of production is changed; instead of man providing from himself the necessary power to execute his work, the power is brought to him from the power house. The individual artizan is now but an unit in the group for production; tradition has to be most severely examined as to its ancestry, what were the then conditions that brought it into being. We live in a country in an age that has no parallel to the past. Never before has the feeling of humanity, our duty and care for human suffering been so recognised and attended to; never before has the hitherto dumb mass of toilers been given such a voice in the management of their welfare and in the Government of the State.

The researches of science and the prodigious achievements of machinery have given the constructors a power unmatched in the most opulent period of Roman magnificence—a power for relieving drudgery, co-ordinating labour, carrying construction to a pitch of accuracy and daring never so much as even dreamt of before: new materials, new knowledge of the capabilities and the physics of old familiar materials, the tradition of the past transmuted into scientific observation and records of what is possible and advisable as to their employment and extension; these are the qualities that should appear in the architecture of our time if our architecture is to be a living art. They must represent the spirit, set forth the wealth of science and mechanical energy that is to our

hand, fused into a serviceable entity by the heat of the spirit of adventure ; and the outcome—in course of time —will be the architecture that we deserve.

NORTHERN ARCHITECTURAL ASSOCIATION.

THE ANNUAL DINNER OF THE NORTHERN ARCHITECTURAL ASSOCIATION was held at Newcastle-upon-Tyne on the 23rd January.

Mr. W. T. Jones, F.R.I.B.A., F.S.A., presided, and the guest of honour was Mr. J. A. Gotch, F.R.I.B.A., F.S.A., President of the Royal Institute of British Architects.

PRINCIPAL MEMBERS AND GUESTS.

W. T. Jones, F.S.A. [*F.*], President, Northern Architectural Association ; J. Alfred Gotch, P.R.I.B.A. ; Councillor T. A. Lowe, Deputy Lord Mayor ; Canon Ellershaw, Master of Durham Castle; Lieut.-Colonel G. Reavell, O.B.E., F.R.I.B.A., Vice-President, Northern Architectural Association ; Major Harry Barnes, Vice-President, R.I.B.A. ; Ian MacAlister, Secretary of the Royal Institute of British Architects ; J. T. Cackett, J.P. [*F.*], Past President, N.A.A. ; A. B. Plummer, J.P. [*F.*] Past President, N.A.A. ; Wm. Milburn, O.B.E. [*F.*], Past President, N.A.A. ; R. Burns Dick [*F.*], Past President, N.A.A. ; C. S. Errington [*F.*], Past President, N.A.A. ; F. N. Weightman, Licentiate, R.I.B.A. ; Geo. G. Gray [*A.*], Hon. Secretary, Northern Architectural Association ; Councillor James Lunn, Chairman, Town Improvements Committee ; Major Robert Temperley, Chairman of the Council of the Newcastle-upon-Tyne Society ; James Scott, President, Newcastle Centre Surveyors' Institute ; S. Addison Smith, F.S.I., A.R.S.I., President Northern Quantity Surveyors' Association ; Douglas G. Cochrane, President Northumberland, Durham and Tees-Side Building Brick Association ; R. S. Middleton, President Sunderland Law Society ; Henry Bell, Inst. Builders, President Northern Counties Federation of Building Trade Employers ; A. M. Oliver, O.B.E., Town Clerk, Newcastle-upon Tyne ; W. J. Steele, D.S.O., A.M.Inst.C.E., City Engineer ; W. H. Hope, Secretary, Northern Counties Building Trade Enployers ; J. A. E. Lofthouse [*F*] ; A. Harrison, Hon. Secretary, Tees-Side Branch N.A.A. ; Dr. Percy Corder ; Lieut.-Colonel H. Cyril Millican ; Frank L. Moore, M.B. ; W. Jennens Hackett ; A. K. Tasker [*F.*] ; J. Wilson Hays [*F.*] ; J. W. Boyd ; R. N. MacKellar [*A.*] ; W. Stockdale [*A.*] ; W. Ellison Fenwick ; L. W. Taylor ; F. M. Dryden, Licentiate R.I.B.A. ; S. W. Milburn, M.C. [*A.*] ; R. Wylie [*A.*] ; S. F. Bestow [*A.*] ; F. A. Child [*A.*] ; G. Talbot Brown [*A.*] ; W. Steel, Licentiate R.I.B.A. ; T. Douglas Caws ; F. H. Checkley, Assist. Hon. Secretary, N.A.A.

Major Robert Temperley, chairman of the Council of the Newcastle-upon-Tyne Society who proposed the toast "The Royal Institute of British Architects and Allied Societies," said most of them were anxious for a revolution with regard to three-fourths of the areas in their industrial cities. That revolution could not take place without an alliance between the lay public and the architects. As Chairman of the Newcastle Society, he acknowledged the initial work of the secretary, Colonel Mitchell, and the helpful support of the architect.

Mr. J. A. Gotch, responding on behalf of the Royal Institute of British Architects, said that with the enormous increase in the number of architects there had been an increase in the quality of the work throughout the country. No longer had they to look to London to supply architectural designs ; and this had been brought home to them by the meritorious work from the provinces to be seen at the great exhibition in Paris.

The present prizes and scholarships of the Institute were to be co-ordinated and a sort of ladder was to be formed so that there would be a crescendo series which would lead from the more simple problems up to the blue riband of the Institute, the Rome Prize. They hoped to form the foundation of maintenance scholarships, which would enable ambitious and skilful lads of narrow means to be trained as architects.

Mr. T. R. Milburn [*F.*], past president of the N.A.A., responded on behalf of the allied societies.

Major Harry Barnes, F.S.I. (vice-president R.I.B.A.), giving the toast of "The Municipal Corporations of the Province," referred to Newcastle's architectural traditions. Referring to housing and new types that were being advocated, he said that there was nothing equal to brick and tile, plaster and slate. Whatever had been found, at its best, was only something approaching the qualities of those materials. It would be most unfortunate if municipalities were led to something else. He hoped the Newcastle Corporation and other corporations would at least be guided by competent architectural advice in the matter, so that there would not spring up all kinds of bricks and fences that would remain as matters of regret.

Responding to the toast, Councillor T. A. Lowe (Deputy Lord Mayor of Newcastle), in the course of his speech, said :—

"I consider that the time has come that we may appeal to you gentlemen to help us educate the public of this district towards creating new municipal buildings. I cannot conceive any other municipality carrying on under such terrible conditions. It is a bad policy to avoid spending money with loss of efficiency."

Other speakers were Lieut.-Colonel G. Reavell [*F.*] (vice-president of the Northern Architectural Association) and Mr. Henry Bell, Associate of the Institute of Builders and President of the Northern Counties' Federation of Building Trades Employers, who referred to the ca' canny spirit that had found its way into the craftsmanship of the builder. If they could get back to the honesty that prevailed 20 or 30 years before the war they could build fairly good and commodious houses for £300 instead of something approaching double that price.

THE NORFOLK AND NORWICH ASSOCIATION OF ARCHITECTS.

The Annual Meeting of the Norfolk and Norwich Association of Architects was held at Norwich, on Friday, 30 January. The annual report and balance sheet were adopted.

The following were elected Officers and Members of Council for 1925.

President.—E. T. Boardman, F.R.I.B.A.

Vice-Presidents.—G. J. Skipper, F.R.I.B.A. ; J. Page, B.A., A.R.I.B.A.

Hon. Secretary.—E. W. B. Scott, A.R.I.B.A.

Council Members.—E. H. Buckingham, A.R.I.B.A. ; C. Upcher ; S. J. Wearing, A.R.I.B.A.

Associate Member of Council.—F. A. Varney.

Honorary Auditor.—J. O. Bond, Lic.A.R.I.B.A.

The prizes awarded for the competitions for measured drawings and sketches, to G. S. Buckingham and G. Bidwell, were presented.

NOTES FROM THE MINUTES OF THE COUNCIL MEETING.

2 *February* 1925.

City Churches Conference.

Sir Banister Fletcher was appointed as a representative of the R.I.B.A. on the City Churches Conference in place of the late Mr. Paul Waterhouse.

R.I.B.A. Maintenance Scholarship.

On the recommendation of the Board of Architectural Education, the Council decided to establish a Maintenance Scholarship of £100 a year, tenable at one of the recognised schools.

Bristol School of Architecture.

The Council decided to make an annual donation to the funds of the Bristol School of Architecture.

R.I.B.A. Examiners.

On the recommendation of the Board of Architectural Education, the R.I.B.A. Examiners for 1925 were appointed as follows :—

Intermediate.

H. Chalton Bradshaw	A.1. & A.2.
Theodore Fyfe	Do.
Arthur Stratton, F.S.A.	Do.
P. J. Waldram	B.
L. de Soissons	C.
Professor L. B. Budden	Do.
L. H. Bucknell	Do.
F. Winton Newman	D.
W. S. Purchon	Do.

Final and Special.

L. de Soissons	A.
Professor L. B. Budden	Do.
L. H. Bucknell	Do.
Donald Cameron	B.1. & B.2.
Alfred Conder	Do.
W. E. Vernon Crompton	Do.
Professor A. C. Dickie	Do.
W. R. Davidge	C.
H. D. Searles-Wood	D.
A Vice-President	E.

Thesis Examiners.

Halsey Ricardo	F.1.
Arthur Stratton, F.S.A.	Do.
S. D. Kitson, F.S.A.	Do.
W. S. Purchon	Do.
Alan E. Munby	F.2.
Raymond Unwin	F.3.
Professor L. B. Budden	Do.

R.I.B.A. Visiting Board.

On the recommendation of the Board of Architectural Education the Council appointed the R.I.B.A. Visiting Board for 1925 as follows :—

Mr. W. Curtis Green, A.R.A., Chairman of the Board of Architectural Education.

Mr. Maurice E. Webb, Vice-Chairman of the Board of Architectural Education.

Mr. Henry M. Fletcher, Hon. Secretary of the Board of Architectural Education.

Professor C. H. Reilly, Teaching Member.

Exhibition of Students' Designs.

On the recommendation of the Board of Architectural Education it was decided that the Schools with Final exemption be required to submit two designs (one of which must be carried to the stage of working drawings) on behalf of each student exempted.

Membership of the Board of Architectural Education.

Mr. Howard Robertson was appointed a Member of the Board of Architectural Education in place of the late Mr. Paul Waterhouse.

British Engineering Standards Association.

The Council made a grant of £5 to the funds of the British Engineering Standards Association.

Reinstatement.

Mr. Fred A. Walker was reinstated as an Associate.

Resignations.

The following resignations were accepted with regret :

Mr. Ellis F. Cook (Licentiate 1910).

Mr. D. W. Sturrock (Licentiate 1911).

Mr. J. H. Willis (Licentiate 1911).

CAMBRIDGE UNIVERSITY SCHOOL OF ARCHITECTURE.

The Board of Architectural Studies at Cambridge have appointed Mr. George Checkley, A.R.I.B.A., at present holding the Jarvis Scholarship, as an Assistant Master in the University School of Architecture. Mr. Checkley will take up his duties at the beginning of the Easter term and return to Rome during the summer to complete his work there.

THE BRITISH SCHOOL AT ROME.

The Rome Scholarship in Architecture 1925 Preliminary Competition.

The Faculty of Architecture of the British School at Rome have selected the following candidates to compete in the final competition for the Rome and Henry Jarvis Scholarships of 1925 :—

F. N. Astbury (Liverpool University).
R. W. Briggs, B.A., A.R.I.B.A. (Manchester University).
G. A. Butling (Liverpool University).
Irene J. Macfadyen (Architectural Association).
C. A. Minoprio, B.Arch. (Liverpool University).
Elsie Rogers, B.A. (Finalist 1924, exempted from Preliminary Competition 1925) (Manchester University).
W. F. Scarlett, B.A. (London University).
H. G. C. Spencely (Liverpool University).
R. J. Willis, M.A., A.R.I.B.A. (Manchester University).

The designs submitted in the Preliminary Competition of 1925 will be on exhibition at the Royal Academy Galleries from 6 to 14 March next.

SOCIÉTÉ DES ARCHITECTES DIPLÔMÉS PAR LE GOUVERNEMENT.

The officials of the S.A.D.G. have been constituted for the year 1925 as follows :

Président :—M. Camille Lefèvre.

Vice-Présidents —MM. M. Aubertin, P. Remaury et E. Maigrot (de Reins).

Secrétaire Général.—M. A. Schneider.

Trésorier.—M. M. Poupinel.

Archiviste.—M. A. Jalabert.

Bibliothécaire.—M. G. Tzakiri.

Secrétaires.—MM. H. Constant-Bernard, R. Segrand, et Mlle. J. Surugire.

Notices

SPECIAL AND BUSINESS GENERAL MEETING 2 MARCH 1925

A Special General Meeting will be held on Monday, 2 March 1925, at 8 p.m., for the following purposes :—

(1) To read the Minutes of the Special General Meeting held on Monday, 16 February 1925 ; (2) to confirm the following resolution which was passed by the requisite majority at a Special General Meeting held on Monday, 16 February 1925 :—

That the new Bye-law 29 be amended by the addition of the following words after paragraph (*f*) :—

"(*g*) The Chairman of the Board of Architectural Education, being a Fellow of the Royal Institute,"

and that the necessary steps be taken to obtain the sanction of the Privy Council to such addition to Bye-law 29 as is required to give effect to this resolution.

(3) To elect the Royal Gold Medallist for the current year. The Chairman to move :—

That, subject to His Majesty's gracious sanction, the Royal Gold Medal for the promotion of Architecture be presented this year to Sir Giles Gilbert Scott, R.A., in recognition of the merit of his work as an architect.

THE NINTH GENERAL MEETING

The Ninth General Meeting (Business) of the Session 1924–25 will be held on Monday, 2 March 1925, at the termination of the Special General Meeting, for the following purposes :—

To read the Minutes of the General Meeting (Ordinary) held on Monday, 2 February 1925 ; formally to admit members attending for the first time since their election.

To proceed with the election of the candidates for membership whose names were published in the JOURNAL for 10 January 1925 (page 160), and 7 February 1925 (page 238).

Mr. Owen Fleming [*A.*], to invite attention to recent and impending architectural changes in the neighbourhood of Charing Cross Station and to move a resolution.

VISIT TO THE SIR JOHN SOANE MUSEUM.

A visit has been arranged by the Art Standing Committee to take place on Saturday, 28th February, to the Sir John Soane Museum. As the number attending must be limited, members desirous of taking part are requested to make early application to the Secretary, R.I.B.A., 9, Conduit Street, London, W.1.

ELECTION OF MEMBERS, 8 JUNE 1925.

Associates who are eligible and desirous of transferring to the Fellowship Class are reminded that if they wish to take advantage of the Election to take place on 8 June 1925, they should send the necessary nomination forms to the Secretary, R.I.B.A., not later than Saturday, 21 March.

THE 58TH ANNUAL CONVENTION OF THE AMERICAN INSTITUTE OF ARCHITECTS.

20TH TO 24TH APRIL 1925.

The attention of Members is called to the cordial invitation received from the President of the American Institute of Architects to British architects to attend the above Convention to be held in New York (see R.I.B.A. JOURNAL, page 194, 24th January 1925).

It is hoped that a substantial number of British architects will be able to take advantage of this most welcome invitation and that they will send their names as soon as possible to the Secretary, R.I.B.A., 9, Conduit Street, London, W.1, from whom particulars can be obtained as to steamship sailings, passage rates, hotel accommodation, passports, etc.

BOARD OF ARCHITECTURAL EDUCATION.

EXHIBITION OF ARCHITECTS' WORKING DRAWINGS.

An Exhibition of Architects' Working Drawings is being held in the R.I.B.A. Galleries and will remain on view until Saturday, 7th March 1925.

The Exhibition will be open daily between the hours of 10 a.m. and 8 p.m. (Saturdays, 5 p.m.) and will include drawings kindly lent by :—

Sir Edwin L. Lutyens, R.A. [*F.*] (Britannic House).
Sir John J. Burnet, A.R.A., R.S.A. [*F.*] (Adelaide House).
Messrs. Helmle and Corbett (Bush House).
Mr. H. S. Goodhart-Rendel [*F.*].

The Exhibition is intended primarily for students of architecture ; they will be able to examine the drawings that a practising architect hands to a contractor, and thus will be afforded an insight into the methods adopted in a modern architect's office.

Competitions

COMPETITION FOR A HIGH BRIDGE OVER COPENHAGEN HARBOUR.

Copenhagen Municipality hereby invite participation in an International Competition in connection with a High Bridge over Copenhagen Harbour.

The Municipality have set apart a sum of 35,000 kroner to be expended in prizes. There will be three prizes, the value of which will be fixed by a Judgment Committee consisting of Members of the Council, together with technicians chosen by the Municipality, the (Danish) Institute of Civil Engineers and the (Danish) Society of Architects. The largest prize will be at least 15,000 kroner.

Programme and particulars in Danish and English can be procured after 1 February 1925, from the City Engineer's Office, Town Hall, Copenhagen B, against a deposit of kr. 100.

The deposit is repayable after the judging, or previously if the drawings, particulars, etc., are returned in good condition. Projects to be delivered to the City Engineers Directorate, Town Hall, before mid-day, 1 September 1925.

After judgment the competing projects will be publicly exhibited at the Town Hall, Copenhagen.

LEAGUE OF NATIONS.

COMPETITION FOR THE SELECTION OF A PLAN WITH A VIEW TO THE CONSTRUCTION OF A CONFERENCE HALL FOR THE LEAGUE OF NATIONS AT GENEVA.

The League of Nations will shortly hold a competition for the selection of a plan with a view to the construction of a Conference Hall at Geneva. The competition will be open to architects who are nationals of States Members of the League of Nations.

An International Jury consisting of well-known architects will examine the plans submitted and decide their order of merit.

A sum of 100,000 Swiss francs will be placed at the disposal of the Jury to be divided among the architects submitting the best plans.

A programme of the competition will be ready in February, 1925, and will be despatched from Geneva so that Governments and competitors may receive copies at approximately the same date. Copies for distant countries will therefore be despatched first.

The British Government will receive a certain number of free copies. These will be deposited at the Royal Institute of British Architects, and application should be made to the Secretary, R.I.B.A., 9, Conduit Street, W.1, by intending competitors.

Single copies can be procured direct from The Secretary-General of the League of Nations at Geneva, for the sum of 20 Swiss francs, payable in advance, but will not be forwarded until after the Government copies have been despatched.

On the nomination of the President of the Royal Institute, Sir John Burnet, A.R.A., has been appointed as the British representative on the Jury of assessors.

UGANDA RAILWAY NEW OFFICE, NAIROBI.

Apply to the Crown Agents for the Colonies, 4 Millbank, Westminster, S.W.1. Closing date for receiving designs, 28 February 1925. Assessor: Mr. William Dunn, F.R.I.B.A. Deposit £1 1s. Telegram received:—

"Reference New Railway Offices. Many requests received from competitors for extension of competition. Agree to one month extension. Please advertise this. Lists of questions and answers being sent by first mail for distribution."

THE NEW INSTITUTE FOR THE BLIND, BUENOS AIRES, ARGENTINE REPUBLIC.

An International Competition has been promoted for the Argentine Institution for the Blind, Buenos Aires, Argentine Republic.

A small number of copies of the Conditions have been deposited in the R.I.B.A. Library for the information of British Architects who may desire to compete.

MASONIC MEMORIAL COMPETITION.

Apply to The Grand Secretary, Freemasons' Hall, Great Queen Street, W.C.2. Last day for applying for conditions, 23 August 1924. Deposit, £1 1s. Closing date for receiving designs, 1 May 1925. Assessors: Sir Edwin Lutyens, R.A. [*F.*] (appointed by the President); Mr. Walter Cave [*F.*], Mr. A. Burnett Brown, F.S.I.

MANCHESTER ART GALLERY.

Apply to the Town Clerk, Town Hall, Manchester. Closing date for receiving designs, 28 February 1925. Assessors: Professor C. H. Reilly, O.B.E. [*F.*], Mr. Percy S. Worthington, Litt.D., F.S.A. [*F.*].

BETHUNE MEMORIAL TO THE MISSING.

The Imperial War Graves Commission desire Members and Licentiates of the Royal Institute to be reminded that applications to take part in the above Competition from persons other than those who had signified their intention of competing on or before 1 January 1924 cannot be considered. Due notice of this regulation was published in the Professional Press on various occasions during August and September, 1923.

TECHNICAL COLLEGE, MIDDLESBROUGH.

The conditions of the above Competition have been submitted to the Competitions Committee of the R.I.B.A., and are found to be in accordance with the Regulations of the R.I.B.A.

ROYAL SOCIETY OF ARTS.

MEMORIAL LIBRARY FOR A COLLEGE COMPETITION.

In order to encourage the study of designs for industrial purposes the second series of open competitions organised by the Royal Society of Arts will include a competition for a Memorial Library for a College suitable for housing a small but rare collection of books.

The conditions are as follows:

A Travelling Scholarship of the value of £150 for one year will be offered on the following conditions:

Candidates must not be over 35 years of age. They must be prepared to travel in France, Italy, Spain or Flanders for six months, which, however, may be broken up into periods of, say, three or two consecutive months.

SUBJECT OF COMPETITION.

The subject is a Memorial Library for a College, suitable for housing a small but rare collection of books.

The superficial area of the room is not to exceed 1,500 feet. The method of arranging the bookcases and displaying a few *objets d'art* is left to the competitor. Cost is not a primary consideration, and the use of expensive woods, as well as inlays of ivory, ebony or metal, in addition to marble, can be considered.

In a suitable place a commemorative panel or some other *motif* should remind the visitor of the origin of the Library. The scheme of the ceiling, which can be treated as a space for decorative painting, as well as the pattern of the floor, must harmonise with the whole design.

A preliminary competition of twelve hours will be held in London and other centres in April 1925. Candidates must give notice of their intention to compete to the Secretary of the Royal Society of Arts, not later than 14 March. For this competition the following drawings will be necessary:

A plan of the floor, one section, and a plan of the ceiling, all to the scale of a quarter of an inch to a foot.

For the final competition two months will be allowed to the competitors, selected after the first competition. The finished drawings are to include the following:

Plans of floor and ceiling and two sections to a scale of half an inch to a foot, a detail drawing of the fireplace or some other feature, showing the complete height and treatment of the room from floor to ceiling.

Competitors should bear in mind that electric lighting and central heating are to be considered.

The competition will take place in June 1925.

Members' Column

ACCOMMODATION OFFERED.

ARCHITECT'S WIDOW offers good accommodation, bed and breakfast, near Russell Square; central for all parts of London. Bath room, electric light; well recommended and terms moderate. —Reply Box 1425, c/o Secretary R.I.B.A., 9 Conduit Street, W.1.

PARTNERSHIP WANTED.

A.R.I.B.A., B.Arch. Liverpool, age 31, desires partnership with established architect who requires a junior, or post in office with a view to partnership. Good qualifications and references.—Apply Box No. 9225, c/o Secretary R.I.B.A., 9 Conduit Street, London, W.1.

A.R.I.B.A. seeks partnership in old-established London firm, willing to invest capital and amalgamate own practice.—Reply Box 3112, c/o Secretary R.I.B.A., 9 Conduit Street, W.

COLLABORATOR WANTED.

COLLABORATOR sought by F.R.I.B.A.; mutual arrangements in offices and work.—Box 482, c/o Secretary R.I.B.A., 9 Conduit Street, London, W.1.

APPOINTMENTS WANTED.

ARCHITECTURAL ENGINEER of very large experience desires work temporary or permanent, anywhere. Special qualifications in geology, mining, drainage, underpinning and shoring, ventilation and heating, foundations and dilapidations, building and land surveying, also levelling. Highest references. Willing to take charge of job.—Apply Box 8322, c/o Secretary R.I.B.A., 9 Conduit Street, W.

STUDENT R.I.B.A., age 22, who has had a particularly sound office training and is at present employed by a leading firm, would be glad to hear from any member or firm requiring assistance. Salary required £286 per annum. Present salary £200 per annum, —Apply Box 5625, c/o Secretary R.I.B.A., 9 Conduit Street, London, W.1.

CLERK OF WORKS RECOMMENDED.

CLERK OF WORKS.—A member thoroughly recommends a good Clerk of Works for Church, College, or Mansion House work.—Full particulars on application to the Secretary R.I.B.A., 9 Conduit Street, London, W.1.

Minutes VIII

SESSION 1924–25.

At a Special General Meeting held on Monday, 16 February, 1925, at 8 p.m., Major Harry Barnes, Vice-President, in the Chair.

The attendance book was signed by 13 Fellows (including 7 Members of the Council), and 17 Associates (including 1 Member of the Council), and 1 Licentiate.

The Minutes of the Special General Meeting held on 7 July, 1924, having been published in the JOURNAL, were taken as read, confirmed, and signed by the Chairman.

The Secretary announced the decease of the following Members:—

Mr. BARR FERREE, B.Sc., of New York, elected Hon. Corr. Member 1894.
Mr. WALTER THOMAS CRESSALL, elected Associate 1891.
Mr. JORDAN GREEN, elected Associate 1903.
Mr. WILLIAM MACKAY, elected Licentiate 1911.

and on the motion of the Chairman it was RESOLVED that the regrets of the Institute for the loss of these Members be recorded on the Minutes of the meeting, and that a message of sympathy and condolence be conveyed to their relatives.

The Chairman having moved the following RESOLUTION which was submitted to the General Body by the Council on the recommendation of the Practice Standing Committee:—

> "That all public buildings paid for out of the rates or other public funds should be technically and architecturally worthy of the locality. To achieve this end, the design of such buildings should either be the subject of competition or entrusted to a qualified architect; and further, that this resolution, if approved, be forwarded to the appropriate authorities."

the resolution was passed *nem. con.*

The Chairman announced that the next business was to consider, and, if thought fit, to approve a scale of architects' charges for housing work prepared by a Special Committee and approved by the Council, with a view to the incorporation of such scale in the R.I.B.A. Scale of Professional Charges in the place of the existing Clause 9. Mr. H. T. Buckland (Vice-President) moved, and Mr. Herbert A. Welch (*F.*) seconded, the following resolution:—

"With the object of assisting in the solution of the national housing problem, and having in view the necessity for the employment of qualified architects on housing work, the members of the Royal Institute of British Architects assembled in general meeting, resolve to modify their charges in connection with housing schemes for local authorities and public utility societies, and agree to accept a reduced scale of charges for such work.

"And, further, that this resolution, if approved, be transmitted to the Ministry of Health and local authorities, together with a copy of the scale."

The resolution, having been seconded, was carried *nem. con.*

The draft scale prepared by the Special Committee was then considered in detail. A number of suggestions having been made for the amendment of the draft scale, it was finally RESOLVED that the scale as drafted be approved, subject to such amendments as might be made by the Special Committee in the light of the criticisms and suggestions put forward at the meeting, and that the Special Committee be given full powers to complete the drafting of the scale and to authorise its publication without the necessity of submitting it again to the General Body. It was further RESOLVED that Clause 9 be omitted from the existing R.I.B.A. Scale of Charges, and that the new Scale of Fees for Housing Work be printed and issued as a separate document. It was further RESOLVED that a very hearty vote of thanks be passed in favour of the Committee for their arduous and successful work in the preparation of the new scale.

The Chairman having announced that the next business was the consideration of the Council's proposal for the amendment of the new Bye-law 29, it was RESOLVED that the new Bye-law 29 be amended by the addition of the following words after paragraph (f):—

"(g) The Chairman of the Board of Architectural Education, being a Fellow of the Royal Institute,"

and that the necessary steps be taken to obtain the sanction of the Privy Council to such addition to Bye-law 29 as is required to give effect to this resolution.

It was further RESOLVED that the Council be requested to give their consideration to the propriety of extending the principle of *ex-officio* representation on the Council to the Chairmen of the four Standing Committees.

The proceedings terminated at 10.5 p.m.

It is desired to point out that the opinions of writers of articles and letters which appear in the R.I.B.A. JOURNAL must be taken as the individual opinions of their authors and not as representative expression of the Institute.

R.I.B.A. JOURNAL.

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